



# QUICK START GUIDE

NVR Series




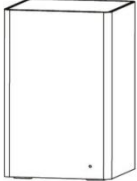
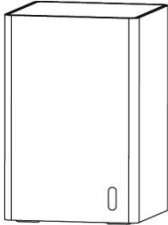



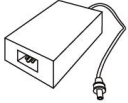


V5.1

## Table of Contents


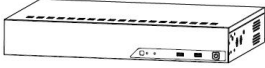
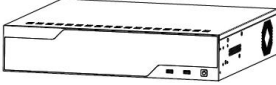












1.Package Contents .....	2
2.Hardware Overview .....	5
3. Interfaces .....	9
4.Installation .....	14
4.1 Mini (PoE) NVR 1000 Series Installation .....	14
4.2 Pro/PoE NVR 5000 Series Installation .....	18
4.3 Pro/PoE NVR 7000 Series Installation .....	29
4.4 Pro NVR 8000 Series Installation .....	35
5.Connection Overview .....	41
6. Ready to Start .....	43
7.Access to NVR .....	44
7.1 Search the NVR via Smart Tools .....	44
7.2 Via WEB .....	46
7.2.1 Log-in .....	46
7.2.2 Live View .....	49
7.3 Via Monitor .....	51


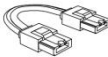


# 1.Package Contents

## Mini (PoE) NVR:

 	<b>MS-N1004-UC/UPC</b> <b>MS-N1008-UC/UPC</b> 	<b>MS-N1008-UNC</b> 	<b>MS-N1008-UNPC</b> 
NVR	x 1	x 1	x 1
 Quick Start Guide	x 1	x 1	x 1
 Warranty Card	x 1	x 1	x 1
 Power Adaptor	x 1 (MS-N1004-UC/ MS-N1008-UC)	x 1	-
 Power Adaptor	x 1 (MS-N1004-UPC/ MS-N1008-UPC)	-	x 1
 Power Cord	x 1 (MS-N1004-UPC/ MS-N1008-UPC)	-	x 1
 HDD Screw	x 4	X 10	x 4

**Pro/PoE NVR:**

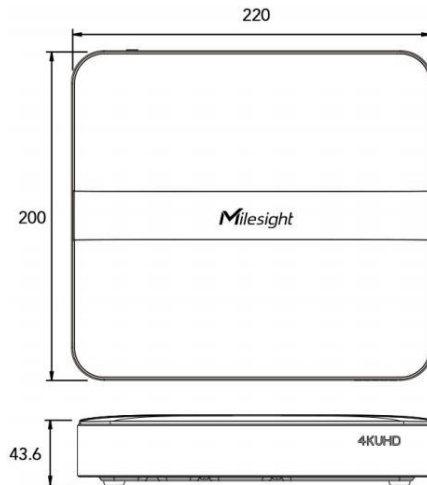
NVR Contents	<b>Pro/PoE 5000 Series</b> 	<b>Pro/PoE 7000 Series</b> 	<b>Pro 8000 Series</b> 
NVR	x 1	x 1	x 1
 Quick Start Guide	x 1	x 1	x 1
 Warranty Card	x 1	x 1	x 1
 Mouse	x 1	x 1	x 1
 Power Cord	x 1	x 1	x 1
 Power Adaptor	x 1 (Pro 5000 Series)	-	-
 2.5" HDD Screw	x 8 (MS-N5008-UC/MS-N5008-UPC)		
 3.5" HDD Screw	x 8 (MS-N5008-UC/MS-N5008-UPC) x 12 (MS-N5016-E/MS-N5016-PE)	x 20	x 36
 HDD Bracket	x 4 (MS-N5016-E/MS-N5016-PE)	-	-
 Mounting Bracket	x 2 (MS-N5008-UC/MS-N5008-UPC)		
 Mounting Bracket	x 2 (MS-N5016-E/MS-N5016-PE)	-	-
 Mounting Bracket	-	x 2	-
 Mounting Bracket	-	-	x 2

 Mounting Bracket Screw	x 4 (MS-N5008-UC/MS-N5008-UPC) x 8 (MS-N5016-E/MS-N5016-PE)	x 8	x 8
 SATA Cable	x 2	x 4	x 8
 HDD Power Cable	x 1	x 1 (Pro 7000 Series)	-
 Terminal	-	x 4 x 2 (MS-N7032-UPH)	x 4

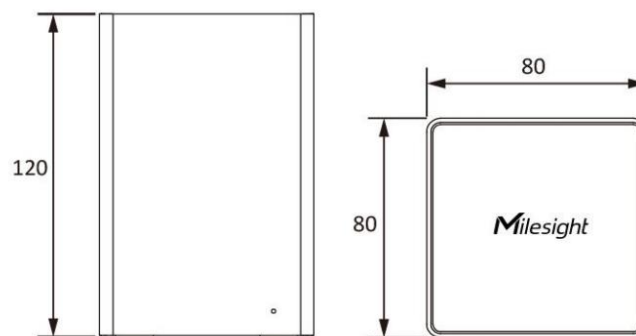
## 2. Hardware Overview

Mini NVR Series:

MS-N1004-UC/MS-N1008-UC:

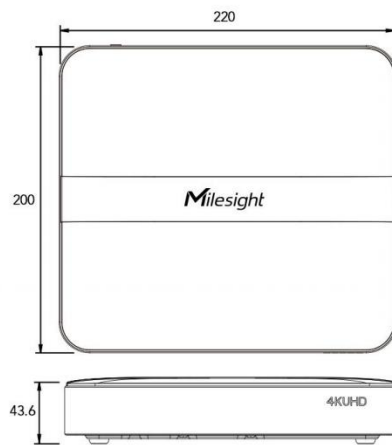


MS-N1008-UNC:

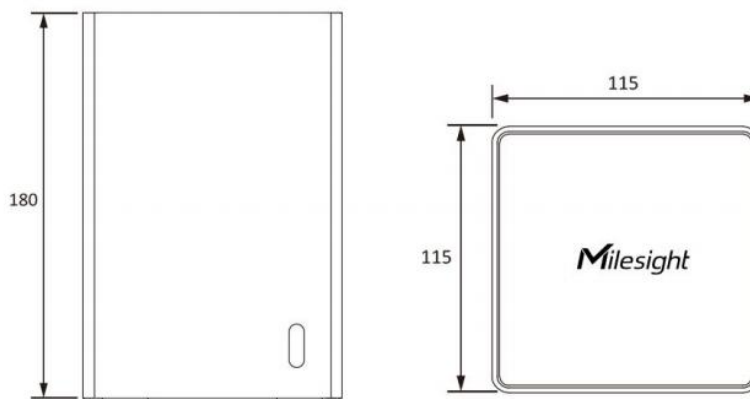


**Mini PoE NVR Series:**

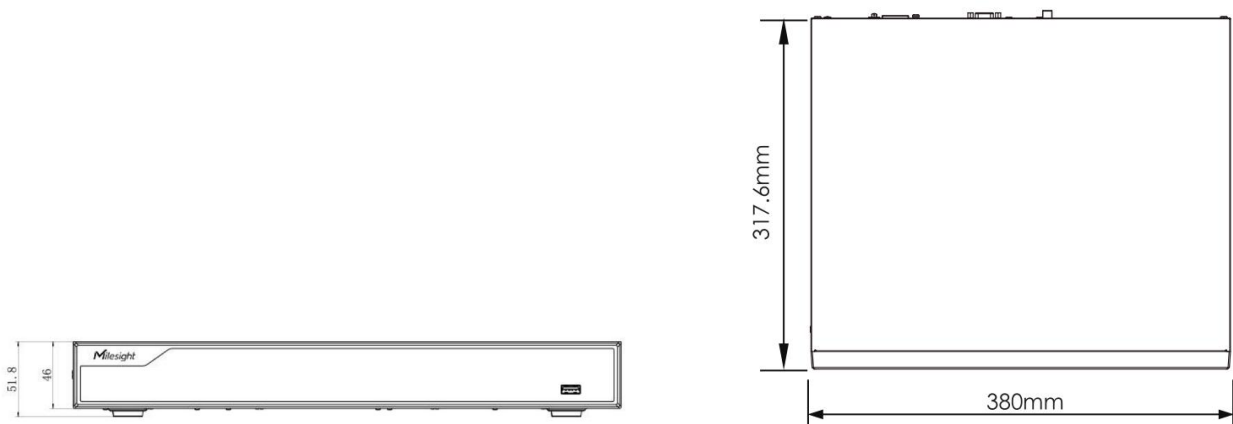
MS-N1004-UPC/MS-N1008-UPC:



MS-N1008-UNPC:

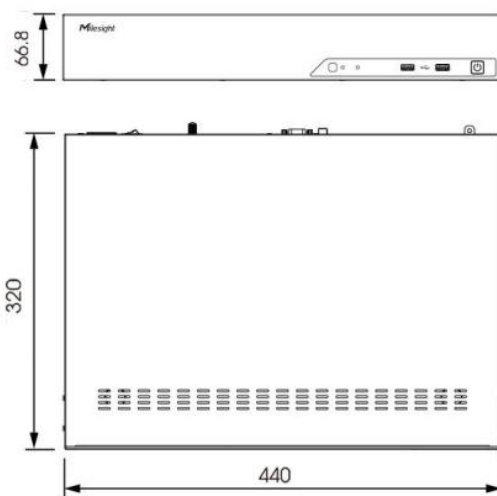
**Pro/PoE 5000 Series:**

MS-N5008-UC/MS-N5008-UPC/MS-N5016-E/MS-N5016-PE:

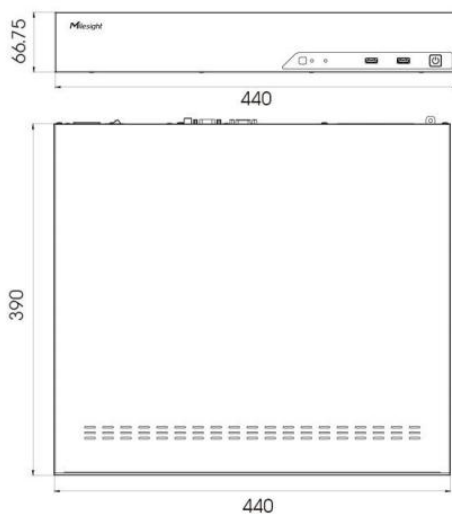


**Pro/PoE 7000 Series:**

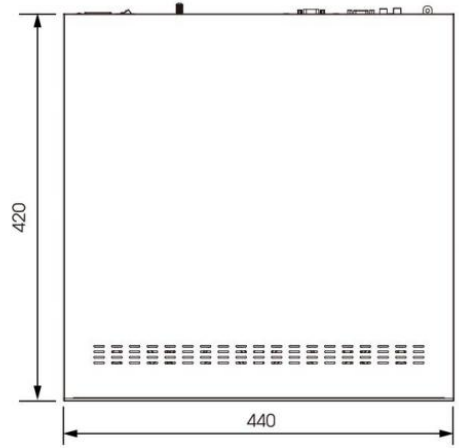
MS-N7016-UH/MS-N7032-UH/MS-N7016-UPH:



MS-N7032-UPH/MS-N7048-UPH:

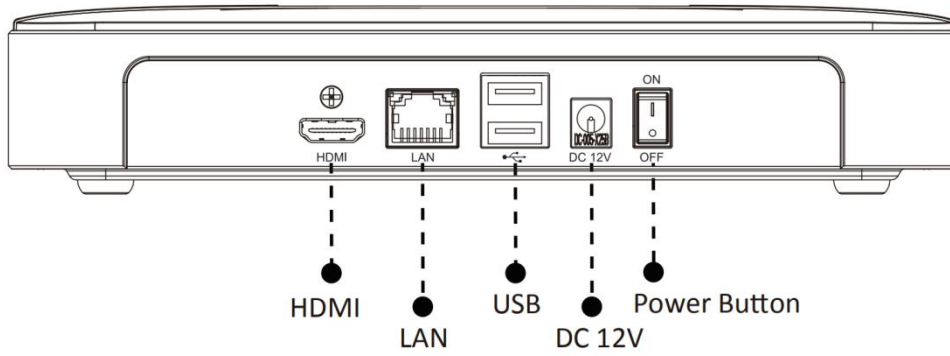
**Pro 8000 Series:**



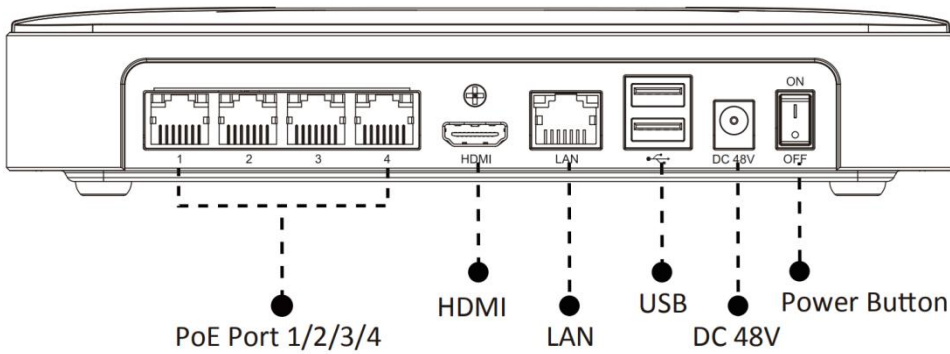


### 3. Interfaces

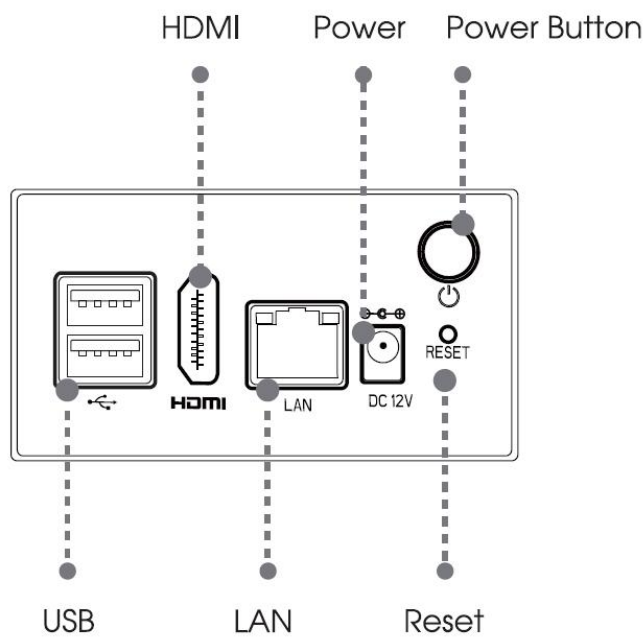
#### MS-N1004-UC/MS-N1008-UC:



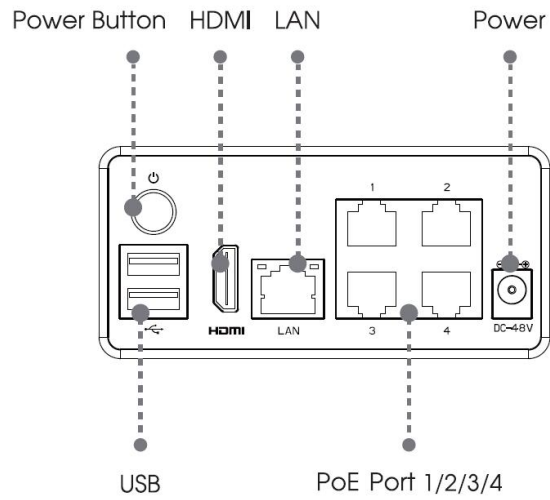
#### MS-N1004-UPC/MS-N1008-UPC:



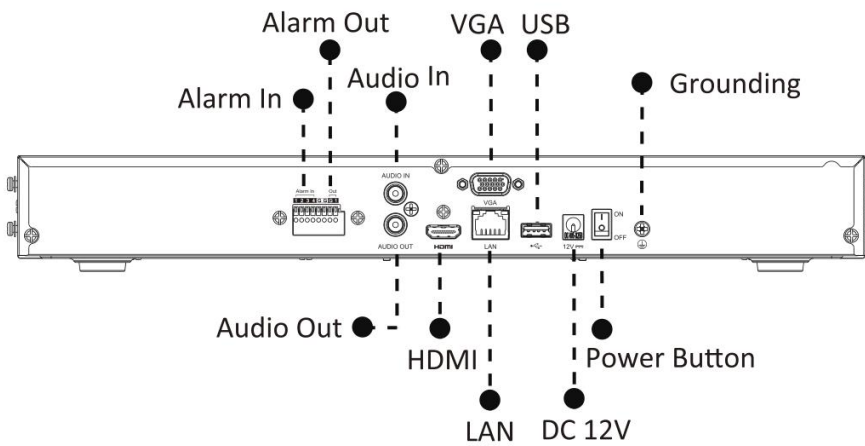
#### MS-N1008-UNC:



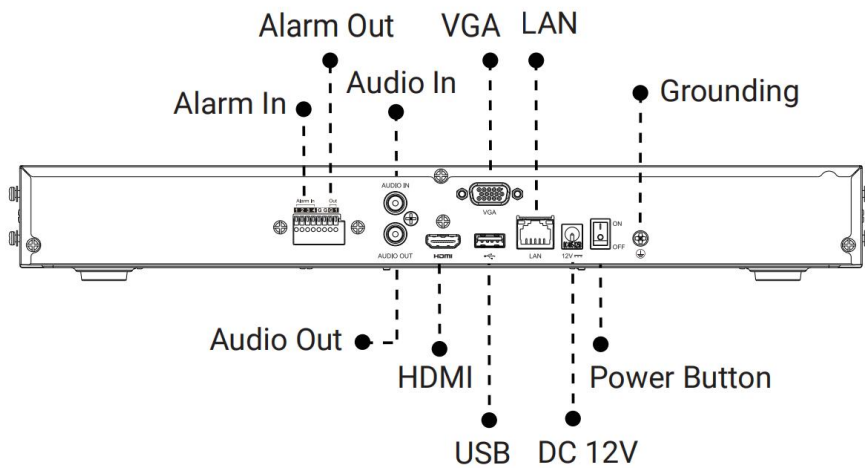
**MS-N1008-UNPC:**



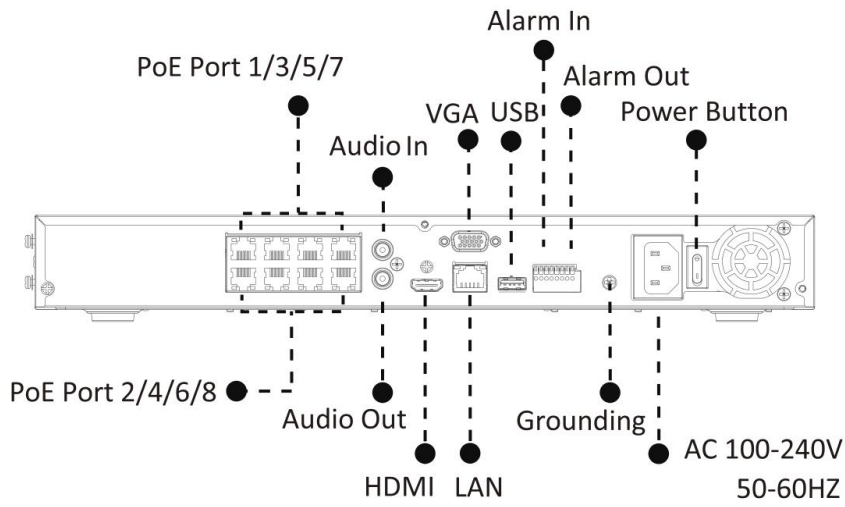
**MS-N5008-UC:**



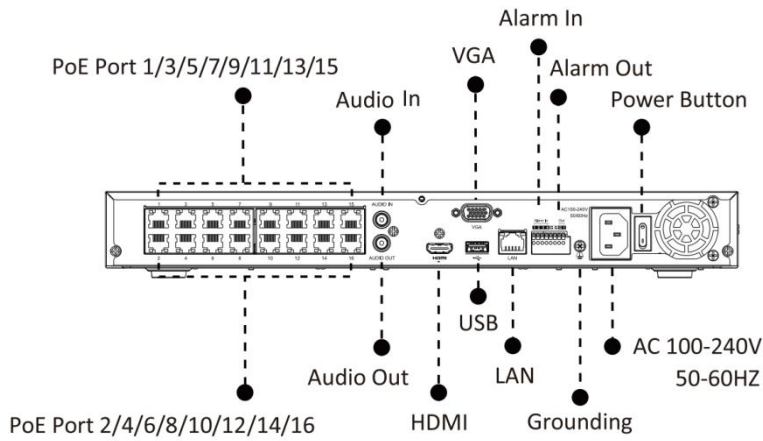
**MS-N5016-E:**



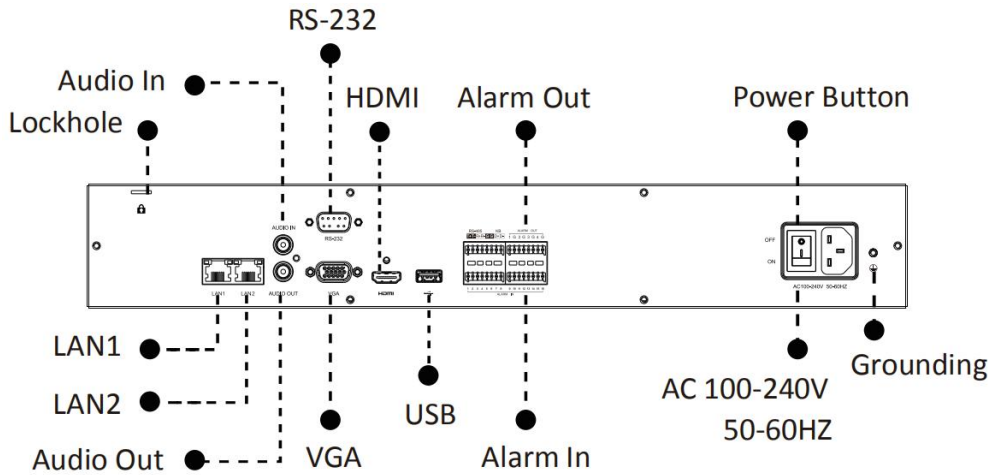
**MS-N5008-UPC:**



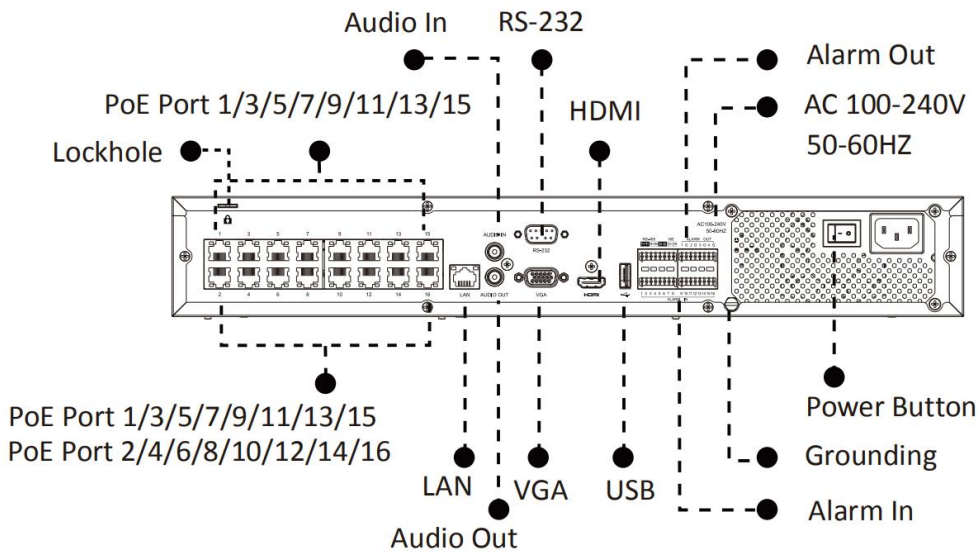
**MS-N5016-PE:**



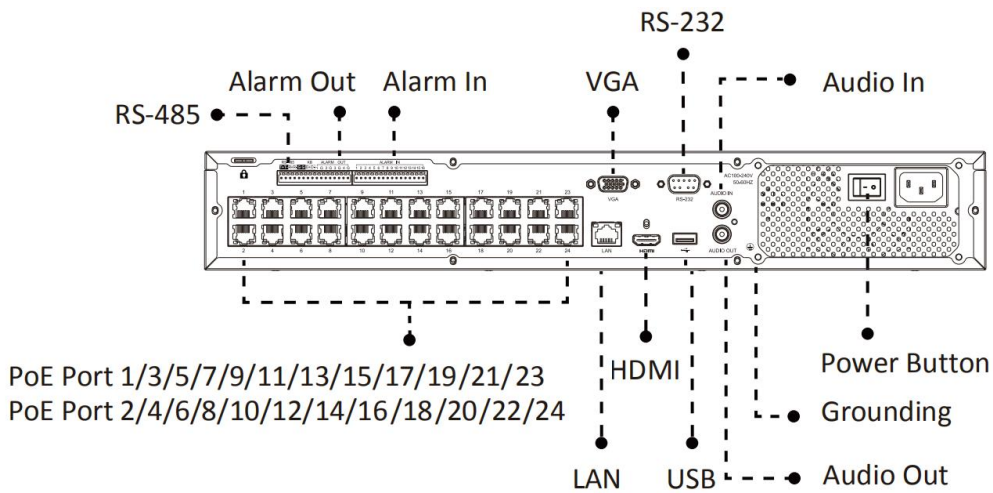
**MS-N7016-UH/MS-N7032-UH:**



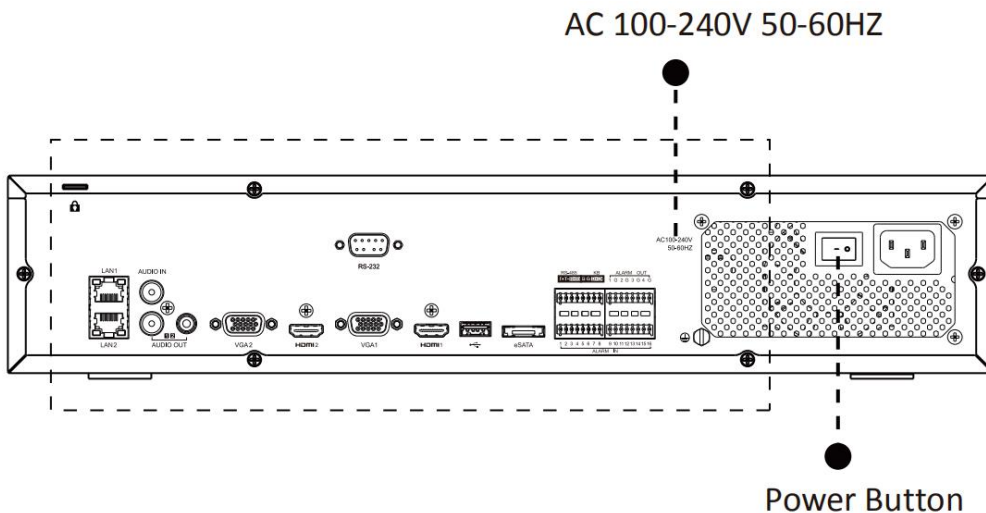
**MS-N7016-UPH:**

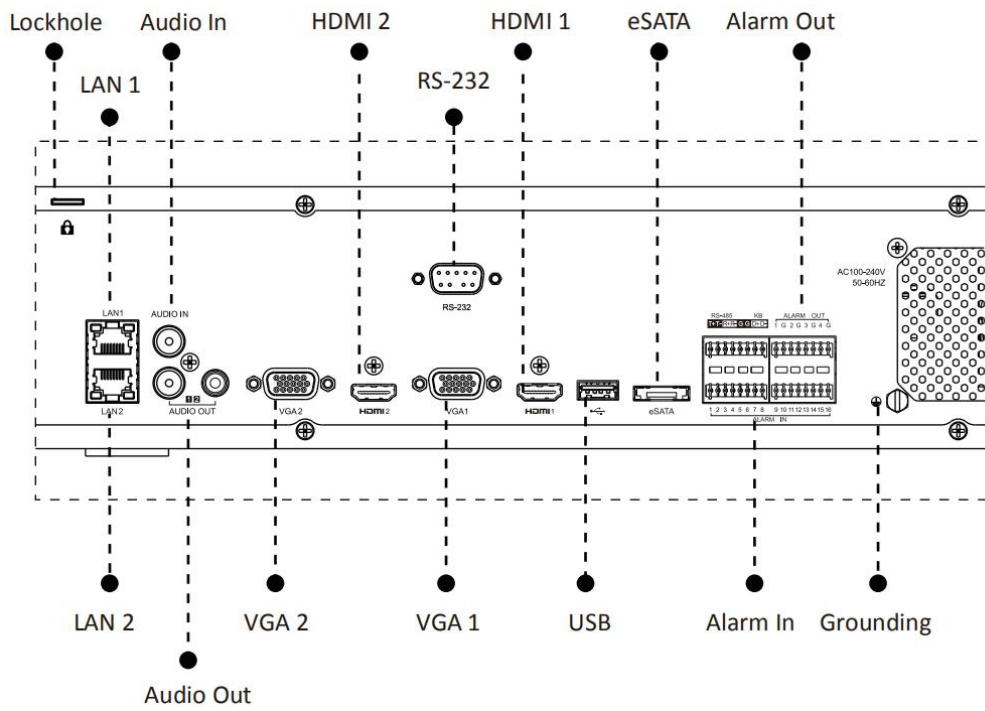


**MS-N7032-UPH/MS-N7048-UPH:**



**MS-N8032-UH/MS-N8064-UH:**

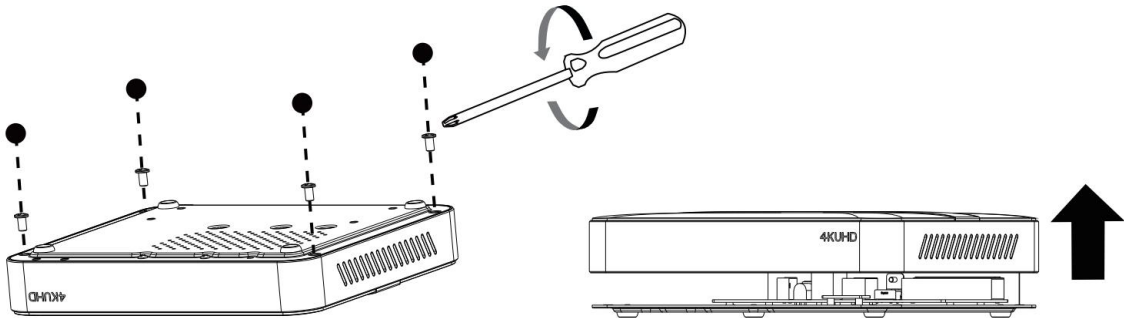




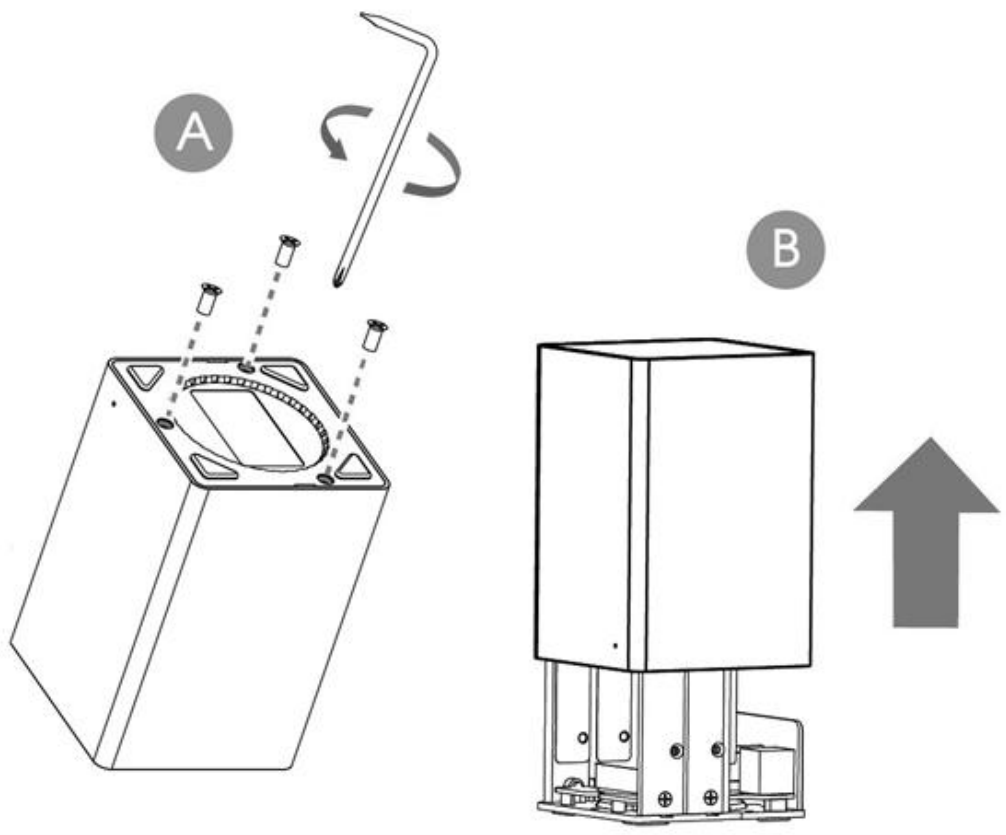
## 4. Installation

### 4.1 Mini (PoE) NVR 1000 Series Installation

Step1: Remove the screws at the bottom panel and pull up the casing.

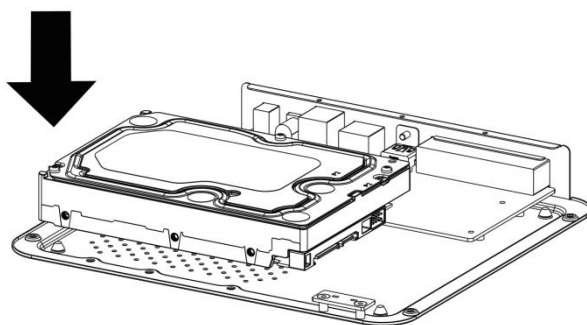


(MS-N1004-UPC/MS-N1008-UPC/MS-N1004-UC/MS-N1008-UC)

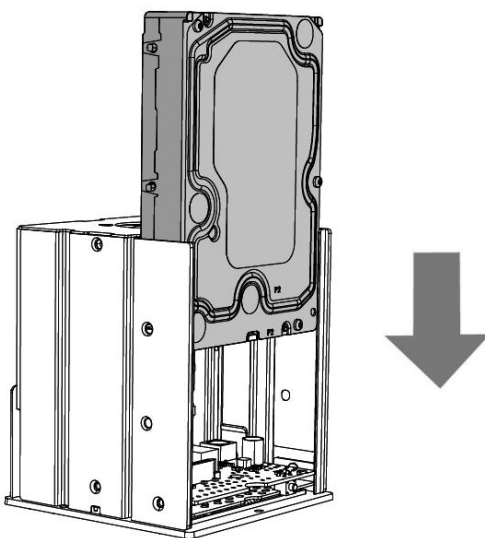


(MS-N1008-UNPC/MS-N1008-UNC)

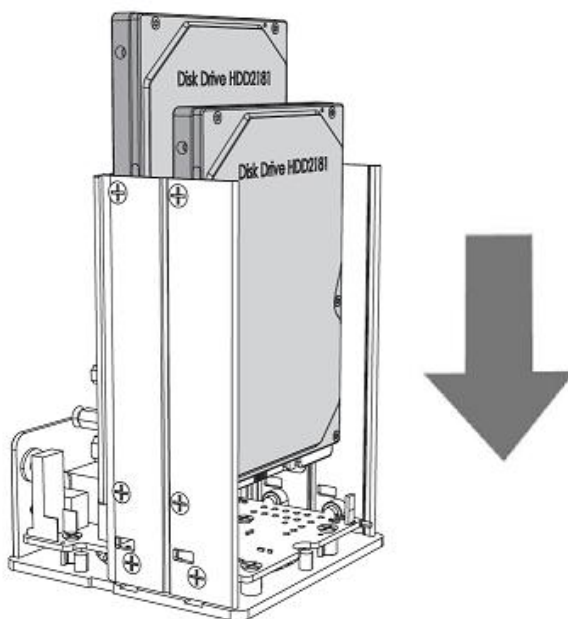
Step2: Insert SATA HDD in the slot as required.



(MS-N1004-UPC/MS-N1008-UPC/MS-N1004-UC/MS-N1008-UC)



(MS-N1008-UNPC)

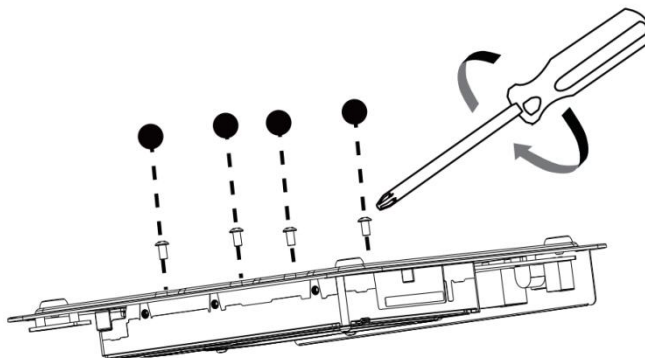


(MS-N1008-UNC)

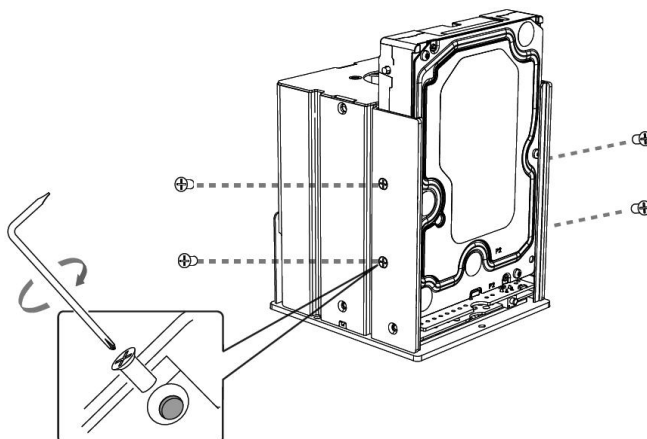


Note: MS-N1008-UNC supports two SATA HDD (2.5"), MS-N1004-UPC/UC and MS-N1008-UNCT support one SATA HDD (3.5").

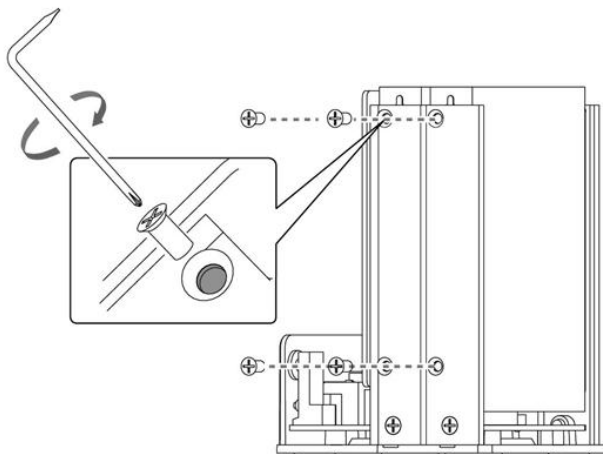
Step3: Secure the HDD with screws.



(MS-N1004-UPC/MS-N1008-UPC/MS-N1004-UC/MS-N1008-UC)

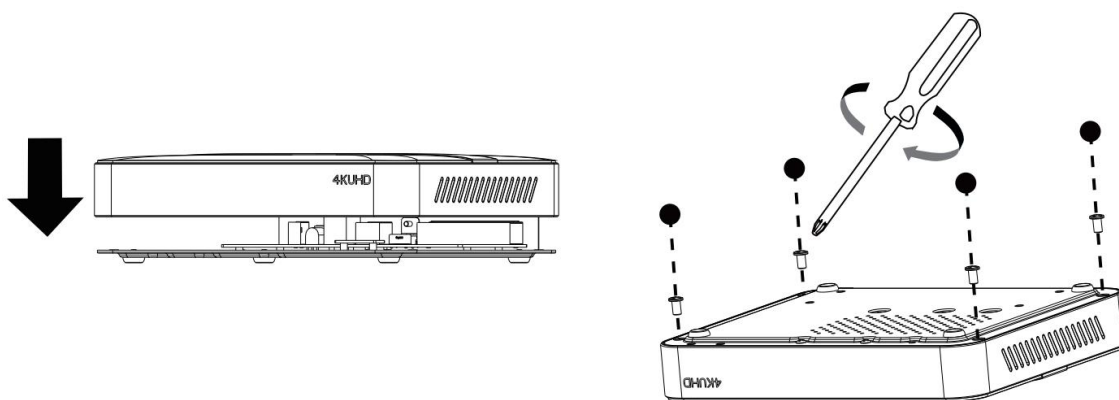


(MS-N1008-UNPC)

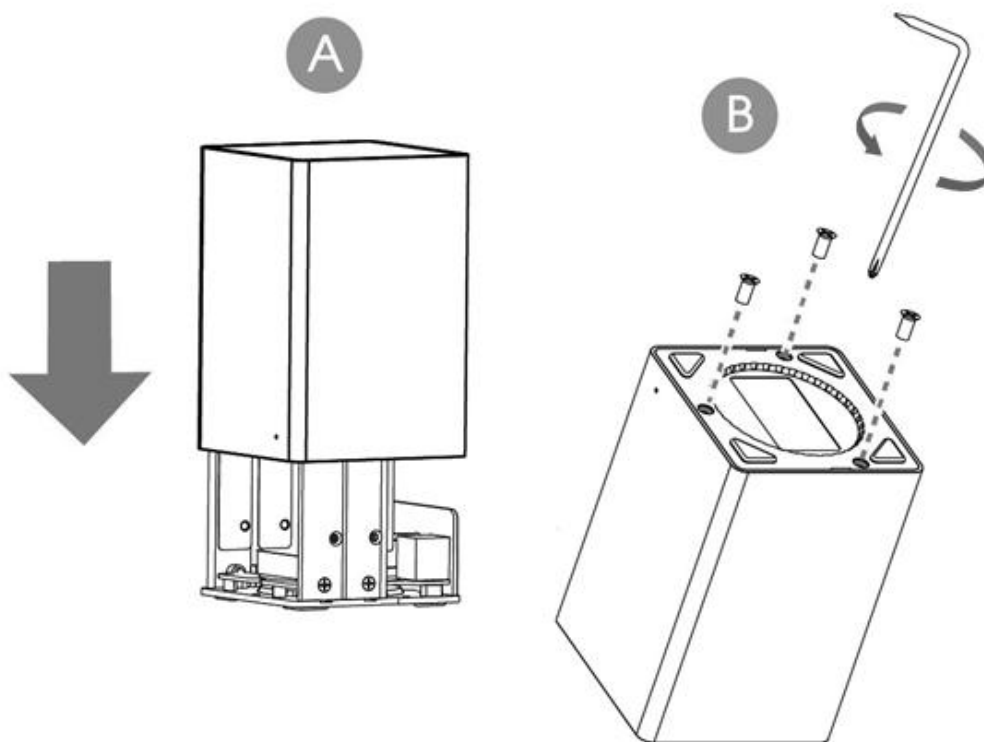


(MS-N1008-UNC)

Step4: Put back the casing and tighten the screws.



(MS-N1004-UPC/MS-N1008-UPC/MS-N1004-UC/MS-N1008-UC)

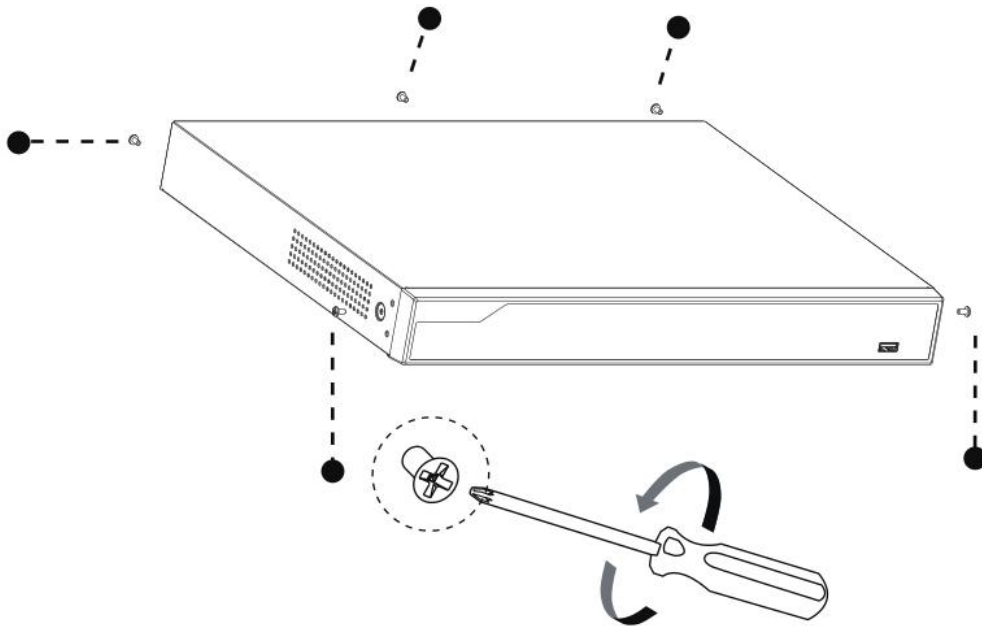


(MS-N1008-UNPC/MS-N1008-UNC)

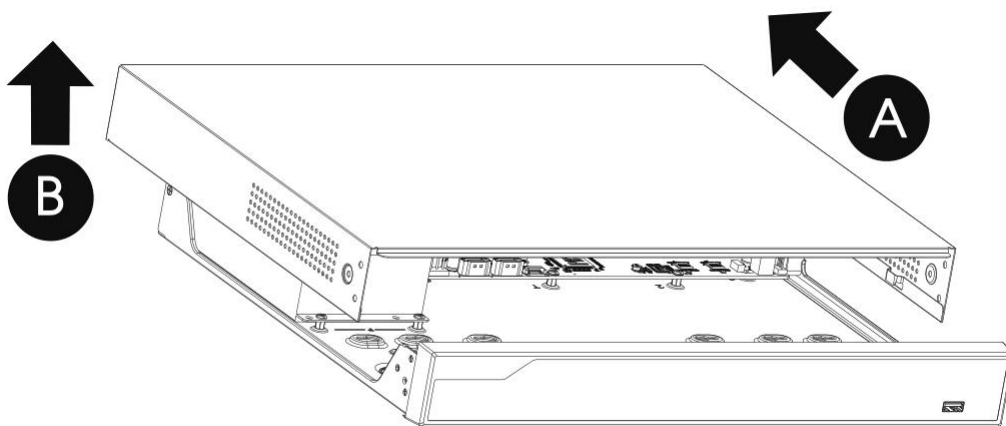
## 4.2 Pro/PoE NVR 5000 Series Installation

MS-N5008-UC/MS-N5008-UPC:

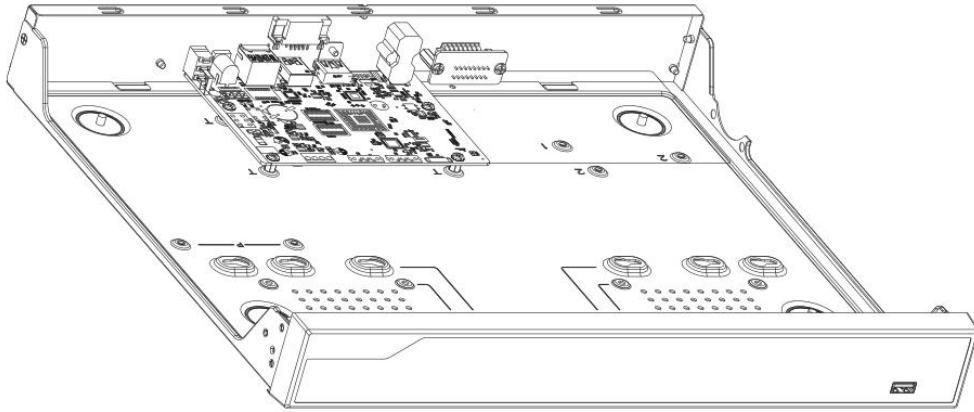
Step1: Using a cross screwdriver to remove the screws at the rear panel and side panel in an anticlockwise direction.



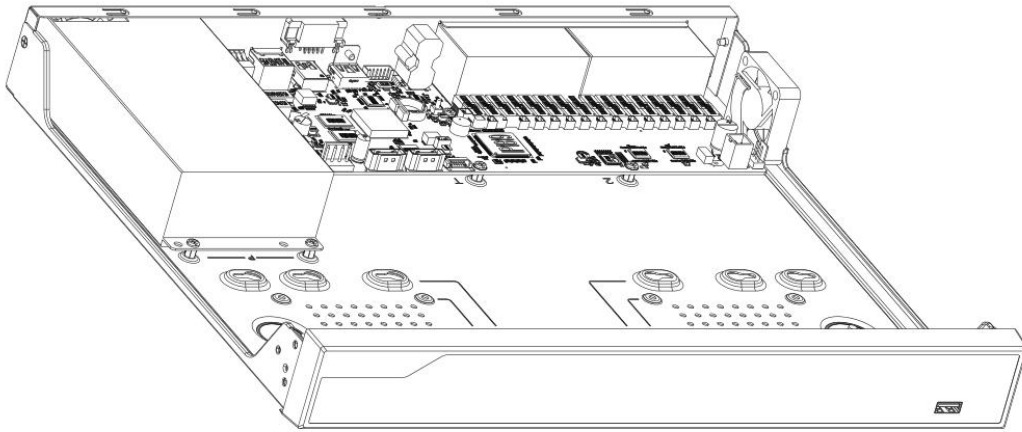
Step2: Slide the upper casing to the rear first and lift it up.



Step3: The internal structure of the nvr is shown as below.

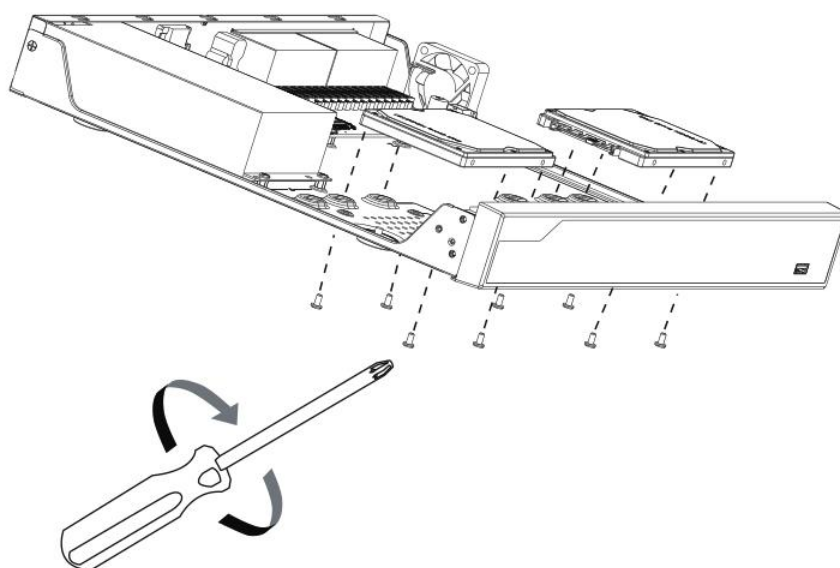


(MS-N5008-UC)

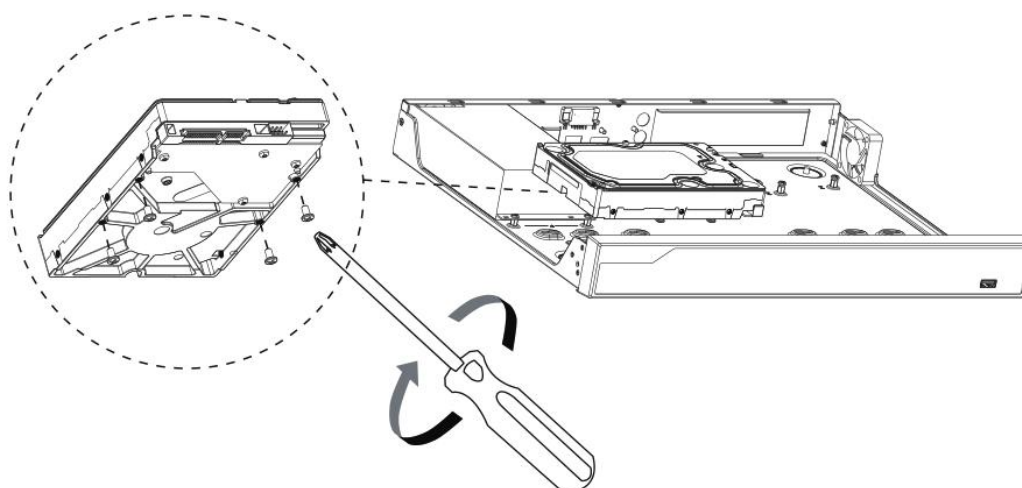


(MS-N5008-UPC)

Step4: Secure the HDD from the bottom of the casing. 4 screws for each HDD.

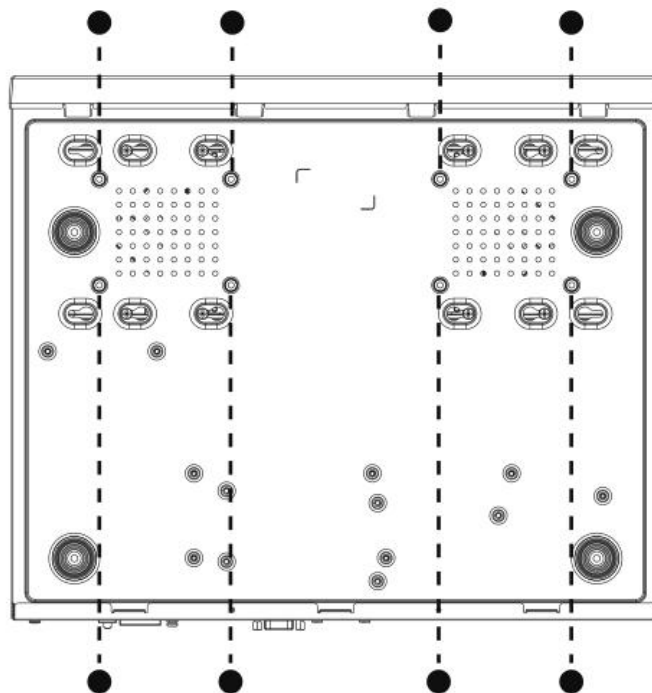


(2.5" HDD Installation)

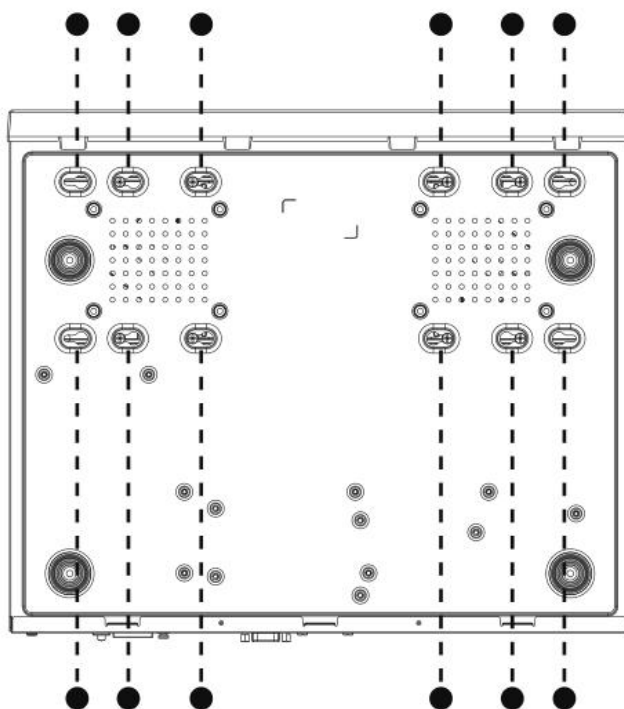


(3.5" HDD Installation)

Step5: After that, check if all the screws are tightened. Then connect the power cable and data cable to each HDD.

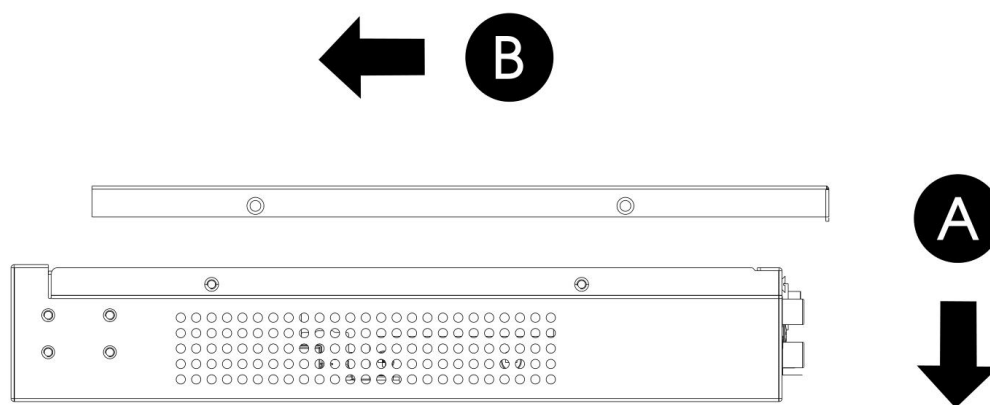


(Screw Position of 2.5" HDD)

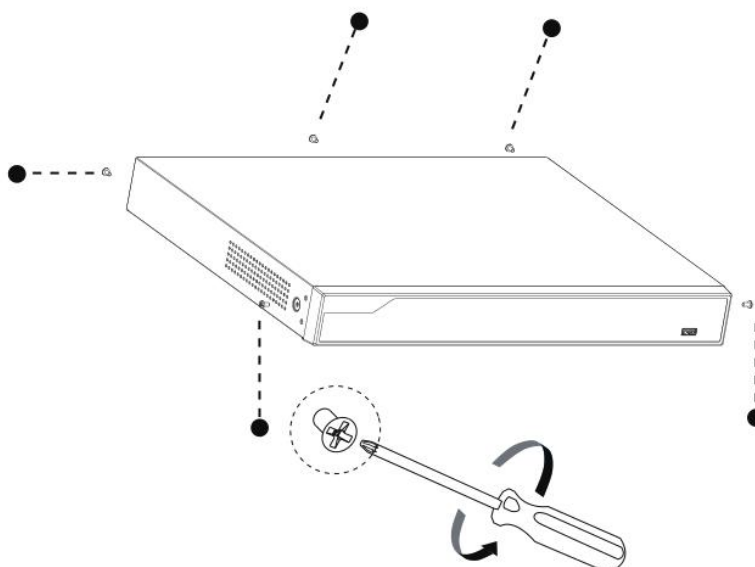


(Screw Position of 3.5" HDD)

Step7: Pull down the upper casing and slide it to the front.

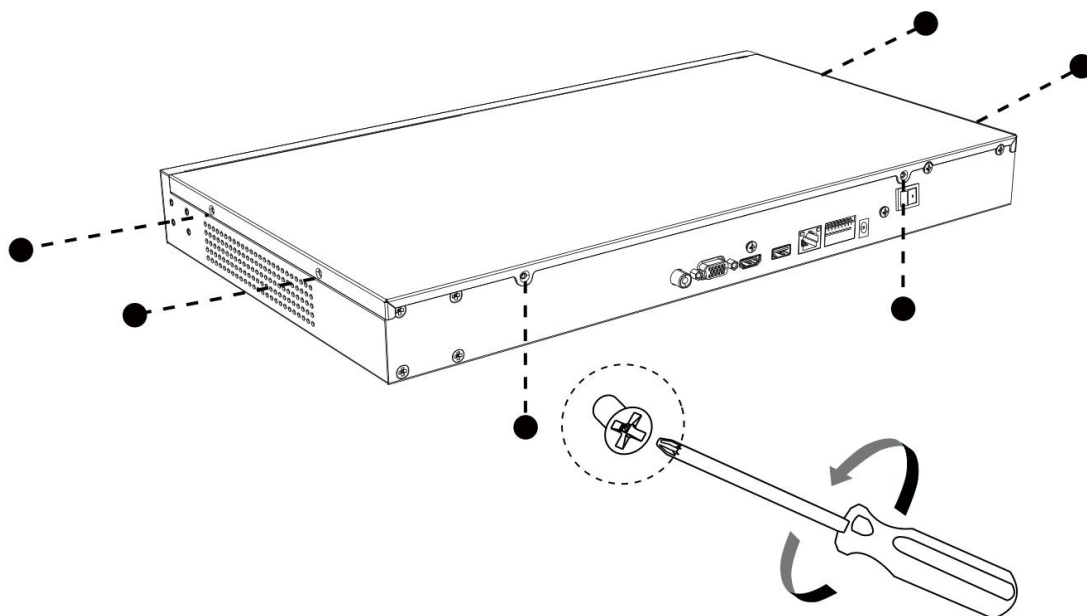


Step7: Lock the screws on the rear panel and side panel.

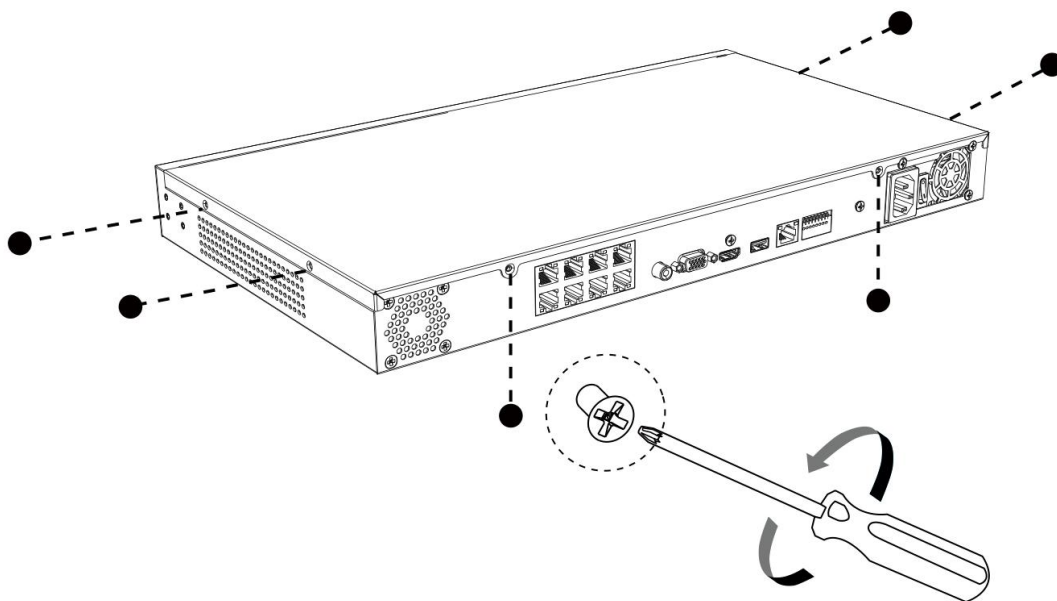


#### MS-N5016-E/MS-N5016-PE:

Step1: Using a cross screwdriver to remove the screws at the rear panel in an anticlockwise direction.



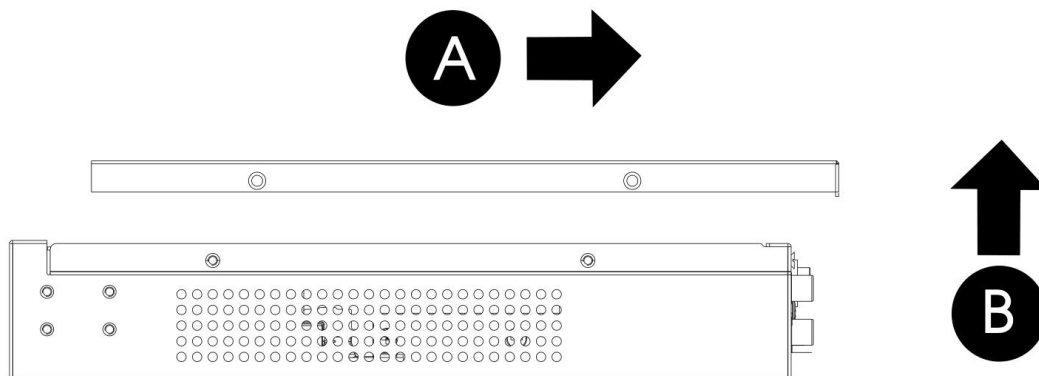
(Pro 5000 Series)



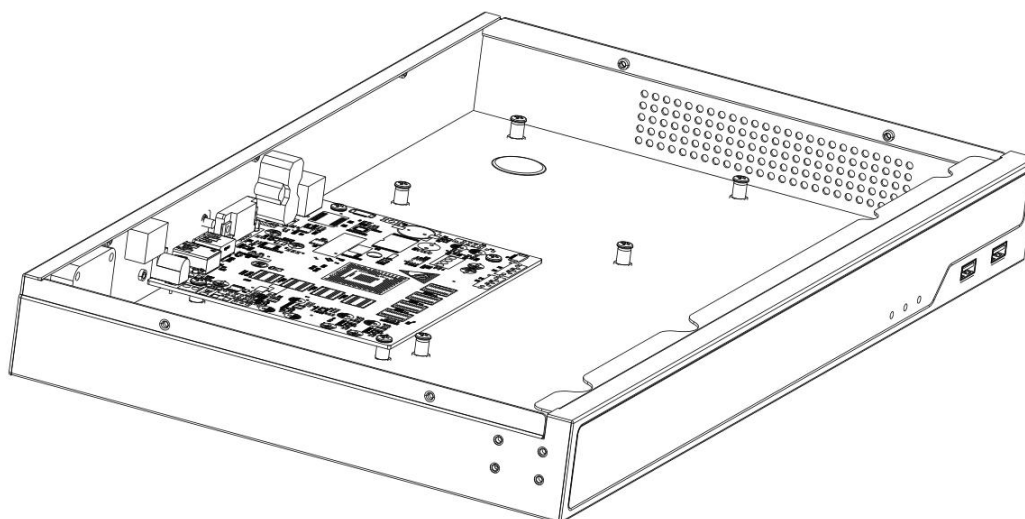
(PoE 5000 Series)

Step2: Slide the upper casing to the right first and lift it up.

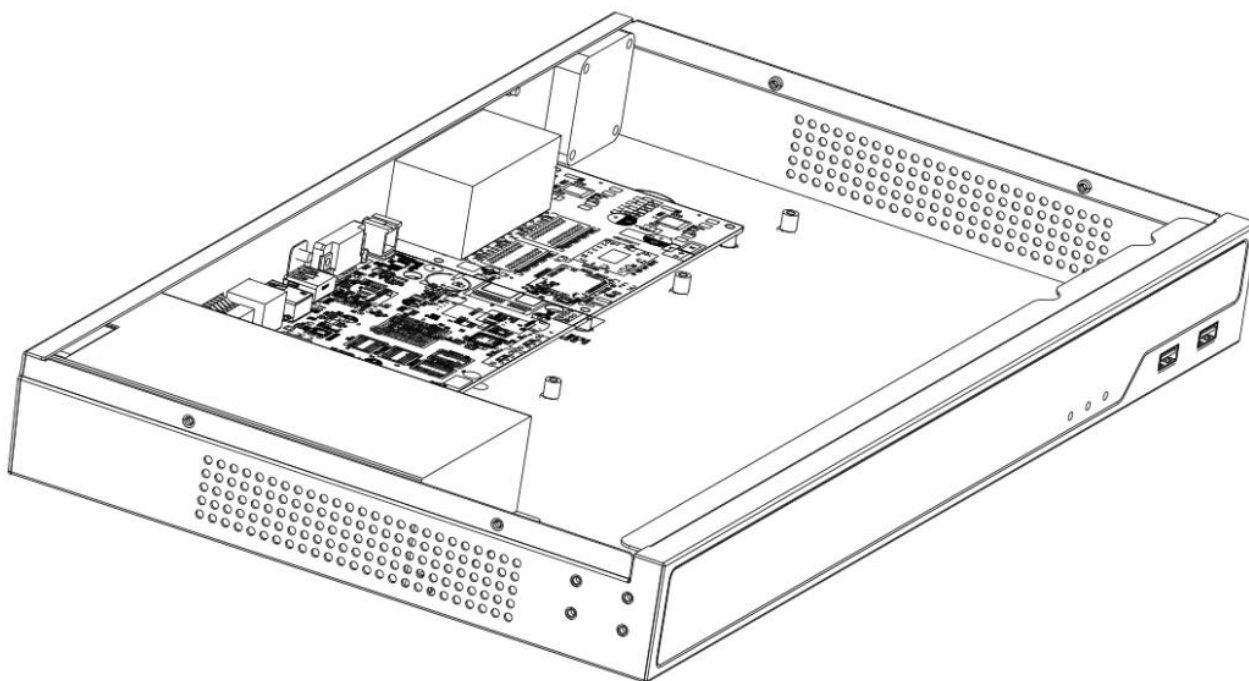




Step3: The internal structure of nvr is shown as below.

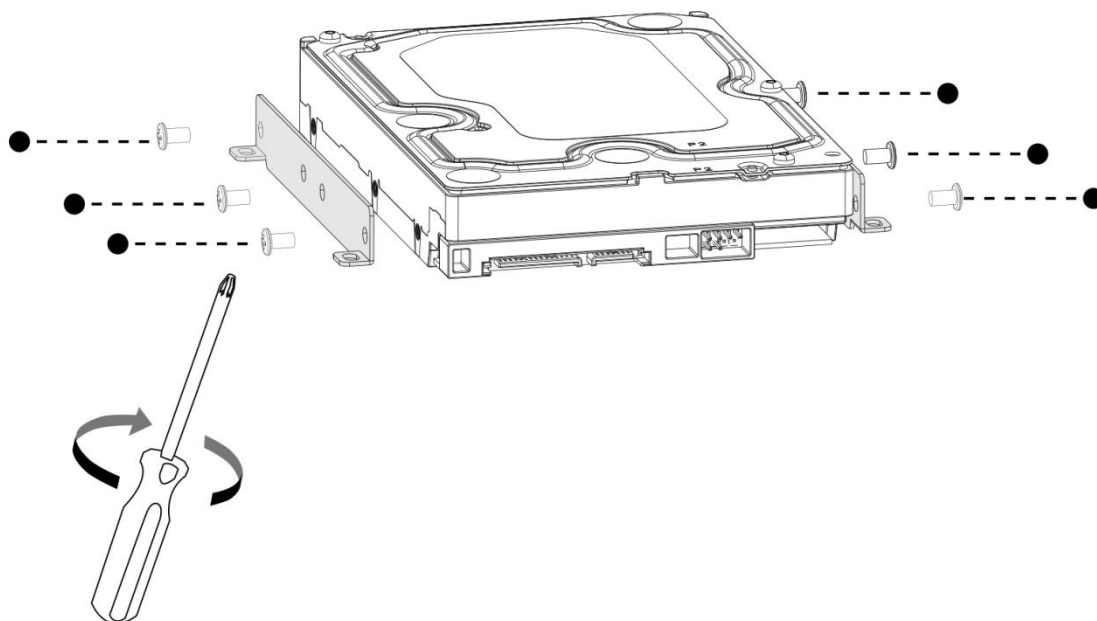


(MS-N5016-E)

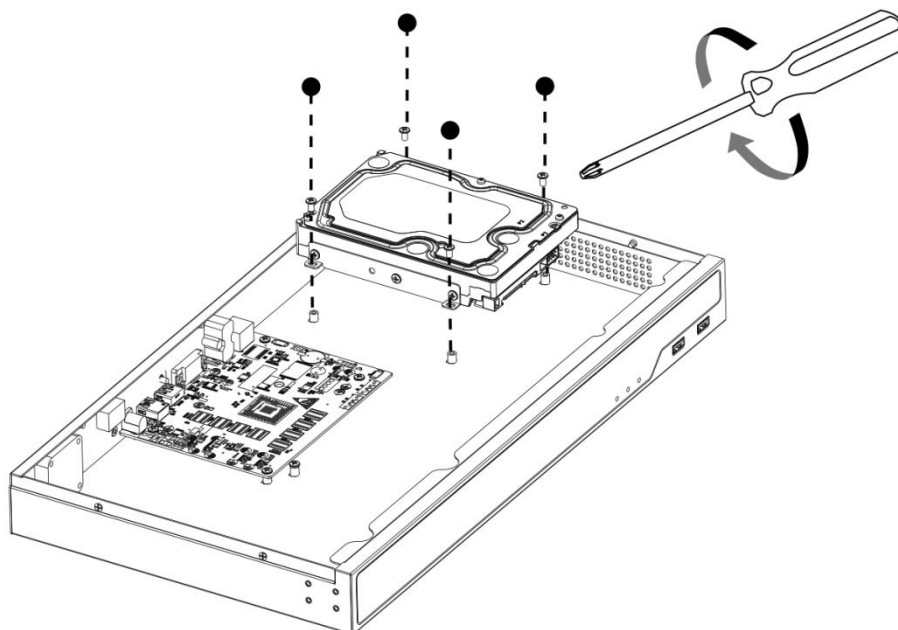


(MS-N5016-PE)

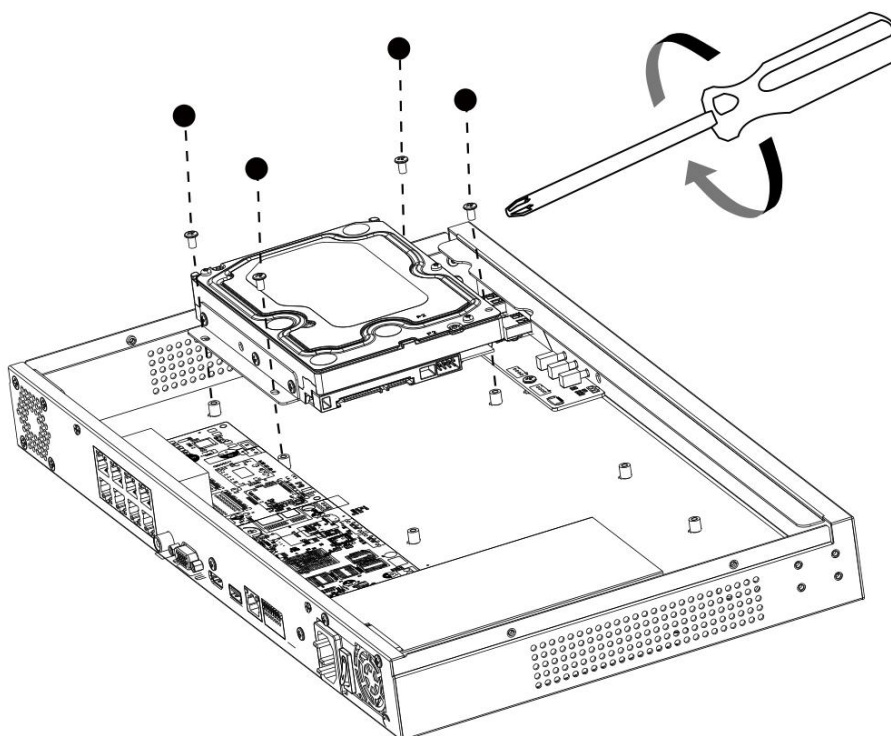
Step4: Hard Disk Installation: Lock the hard disk with the HDD bracket. 6 screws for each hard disk installation.



Step5: Secure the HDD brackets with hard disks in the casing. 4 screws for each HDD bracket.

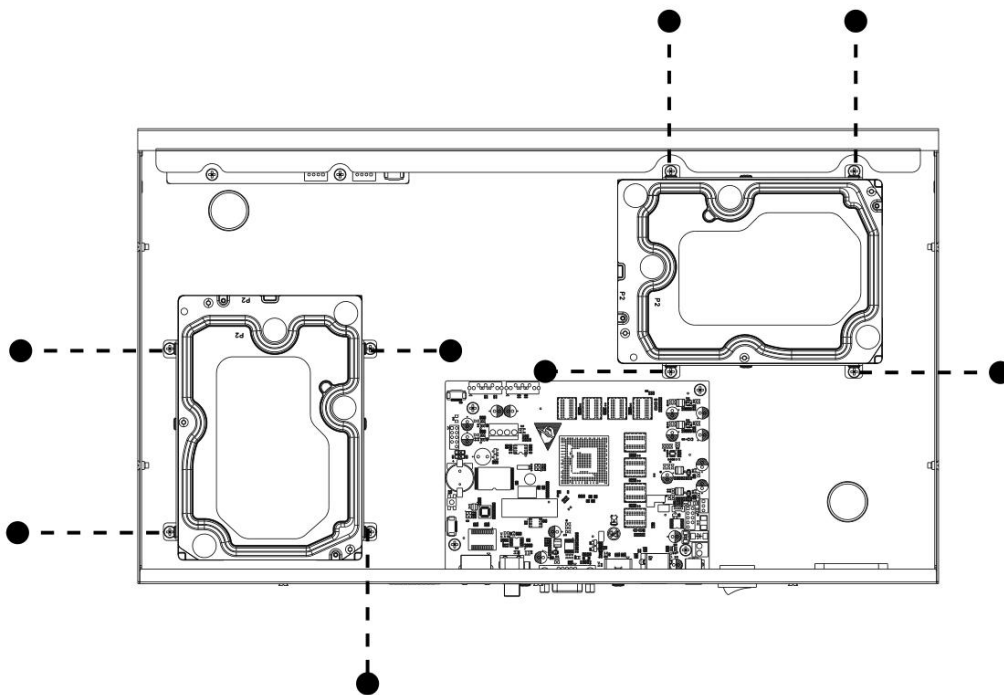


(MS-N5016-E)

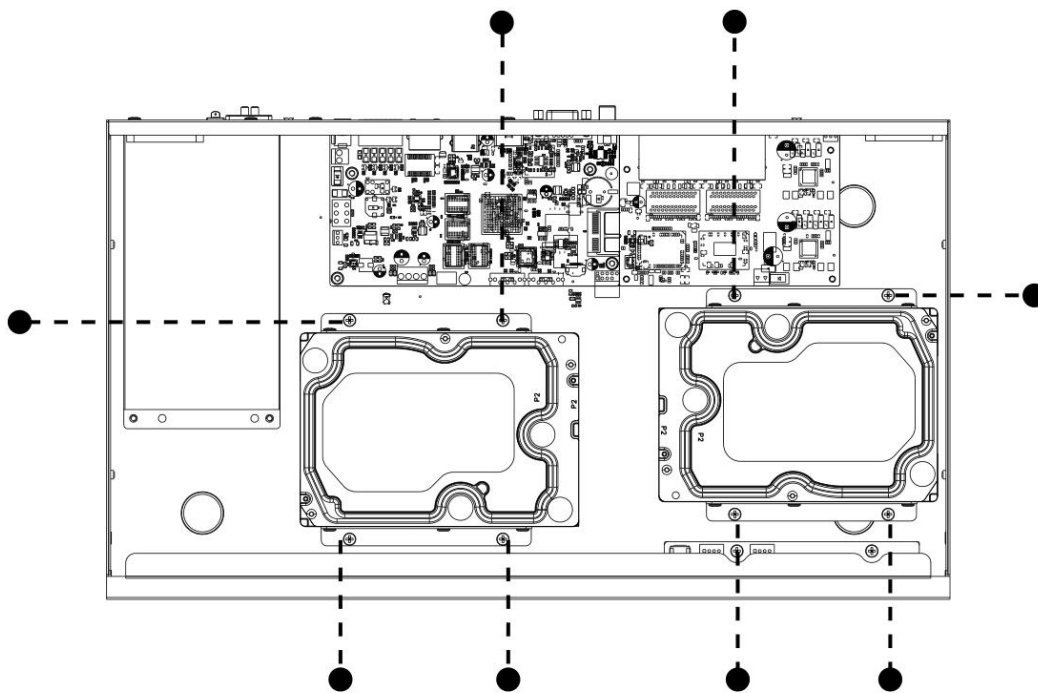


(MS-N5016-PE)

Step6: After that, check if all the screws are tightened. Then connect the power cable and data cable to each HDD.

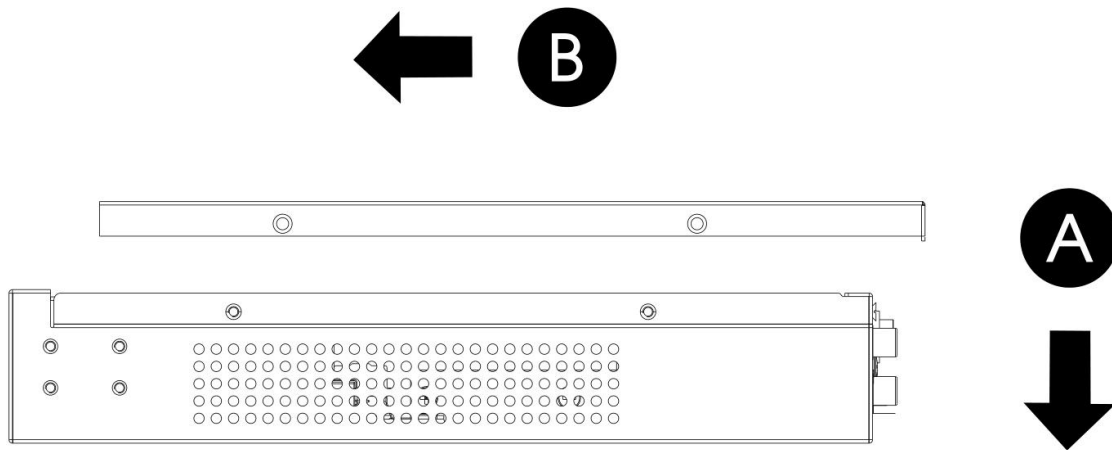


(MS-N5016-E)

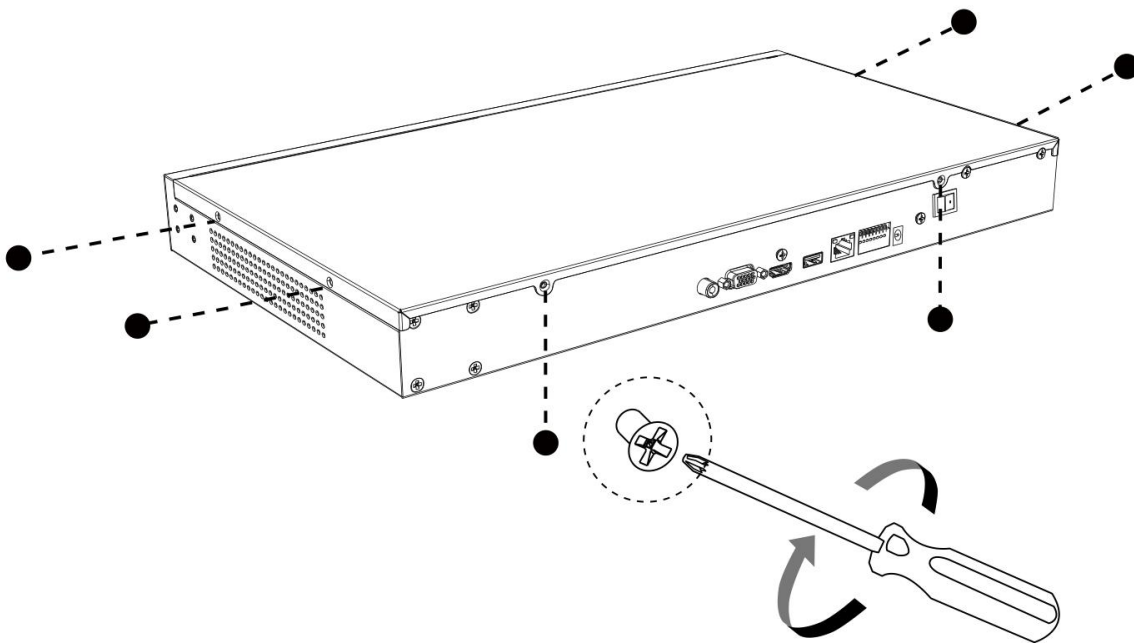


(MS-N5016-PE)

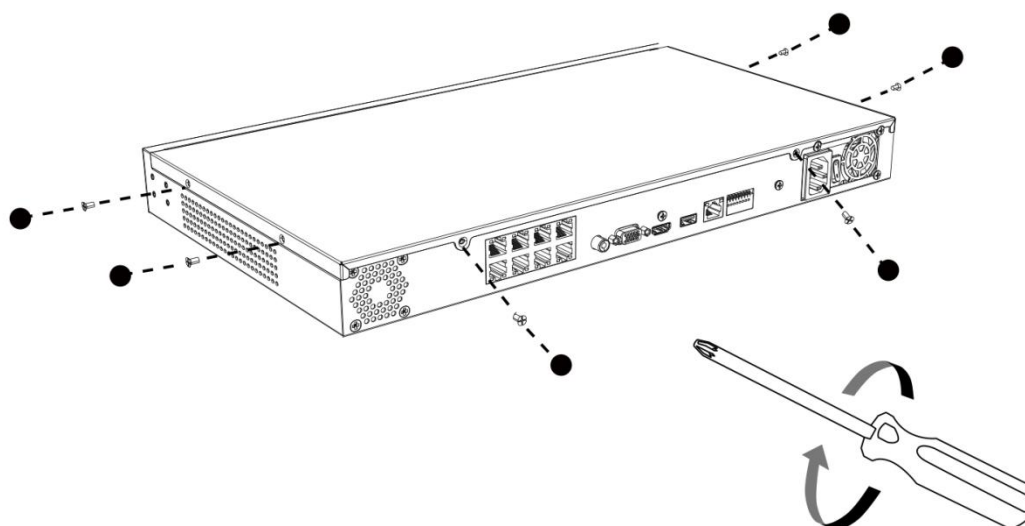
Step7: Pull down the upper casing and slide it to the left.



Step8: Retighten the screws on the rear panel.



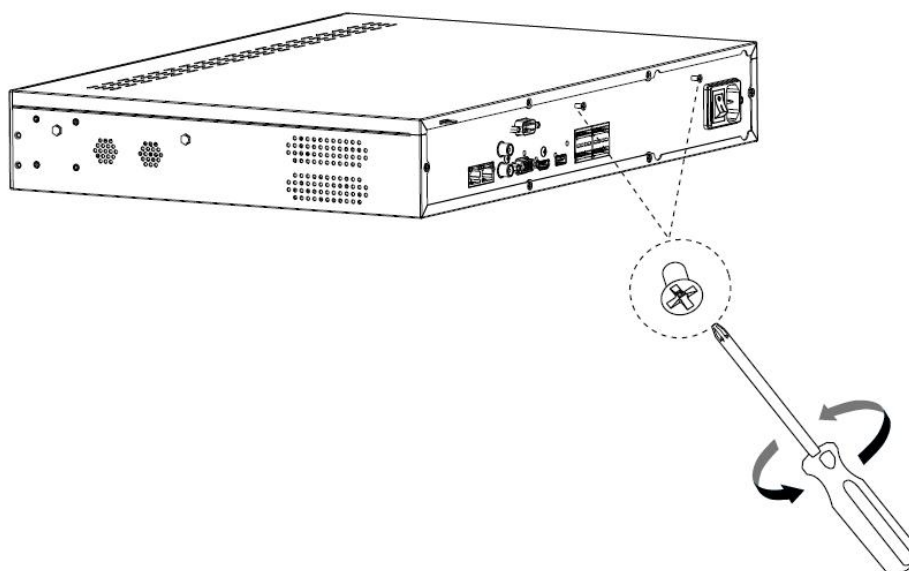
(MS-N5016-E)



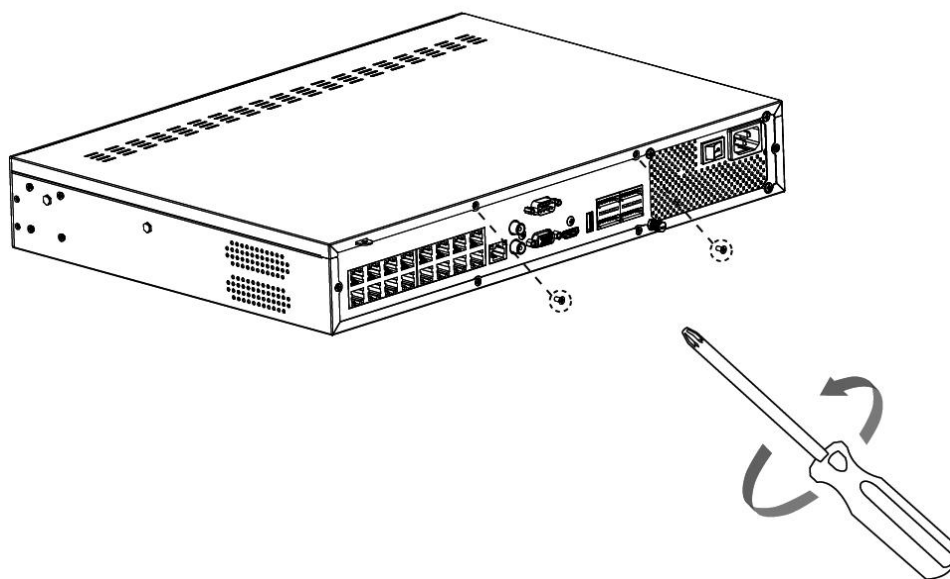
(MS-N5016-PE)

### 4.3 Pro/PoE NVR 7000 Series Installation

Step1: Using a cross screwdriver to remove the screws at the rear panel in an anticlockwise direction.

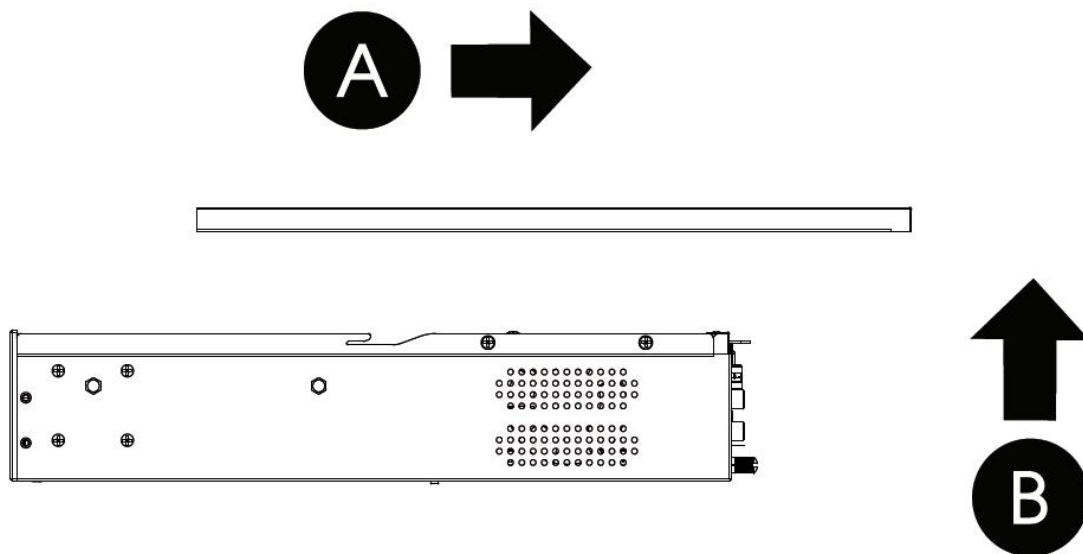


(Pro 7000 Series)

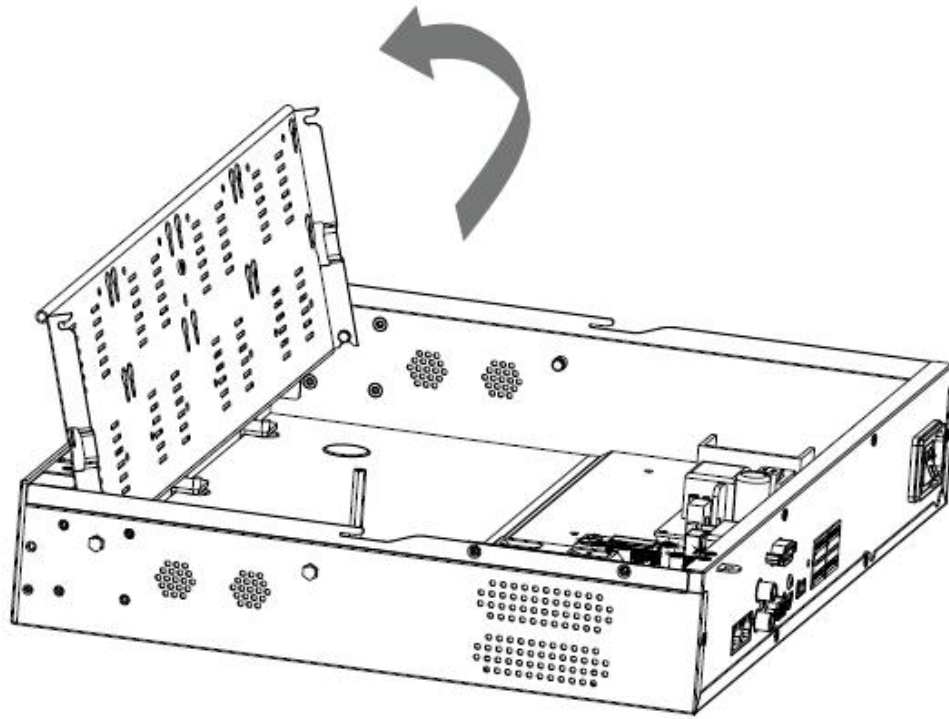


(PoE 7000 Series)

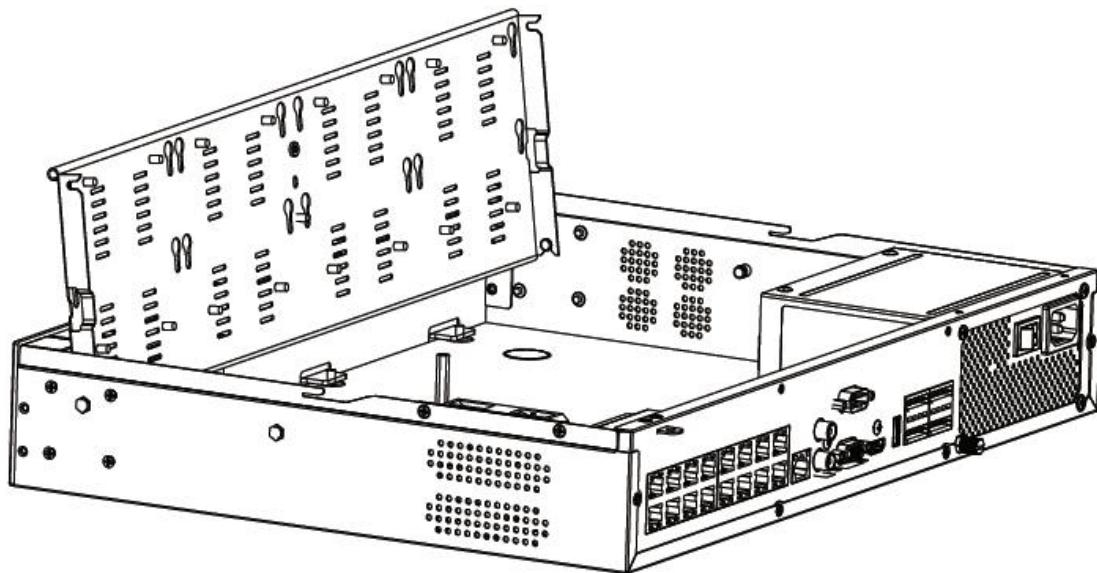
Step2: Slide the upper casing to the right first and lift it up.



Step3: The HDD bracket is rotatable and can be taken down by pulling up and rotating one side of it.



(Pro 7000 Series)

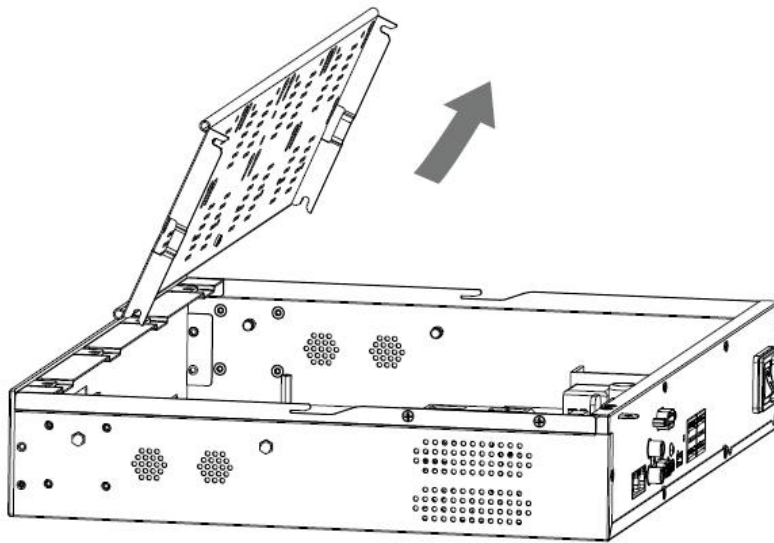


(PoE 7000 Series)

Step4: To install HDD more conveniently, you can:

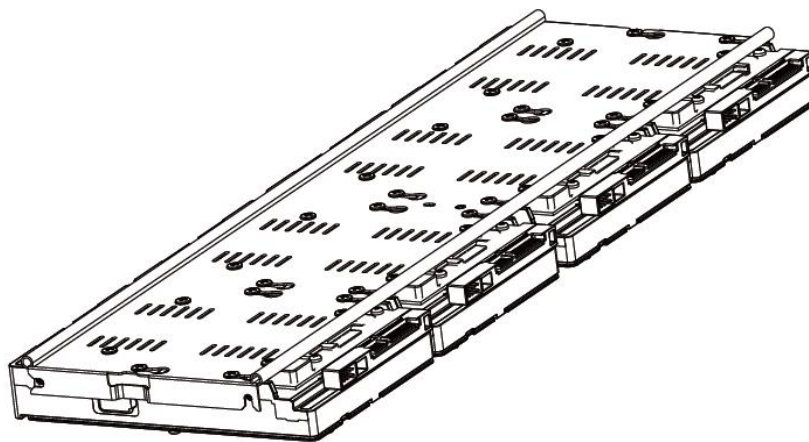
1) Remove the bracket.



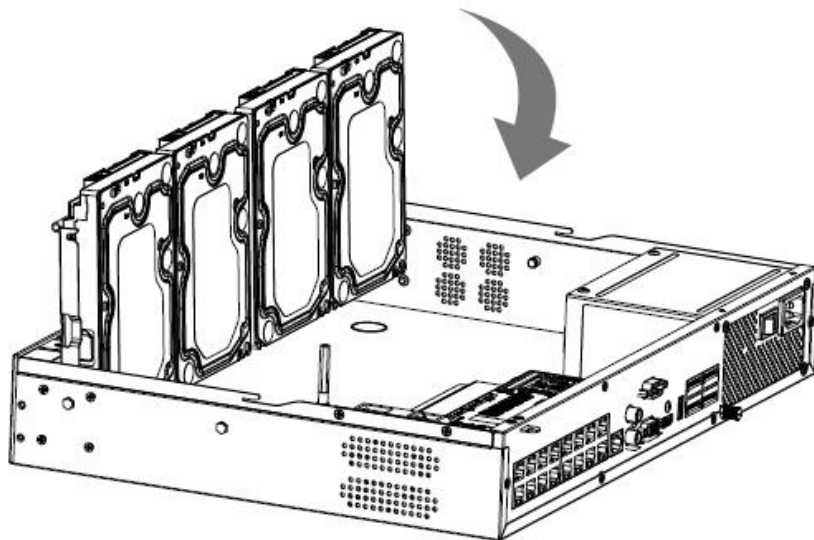


(Pro 7000 Series)

2) Install the HDD on the bracket.

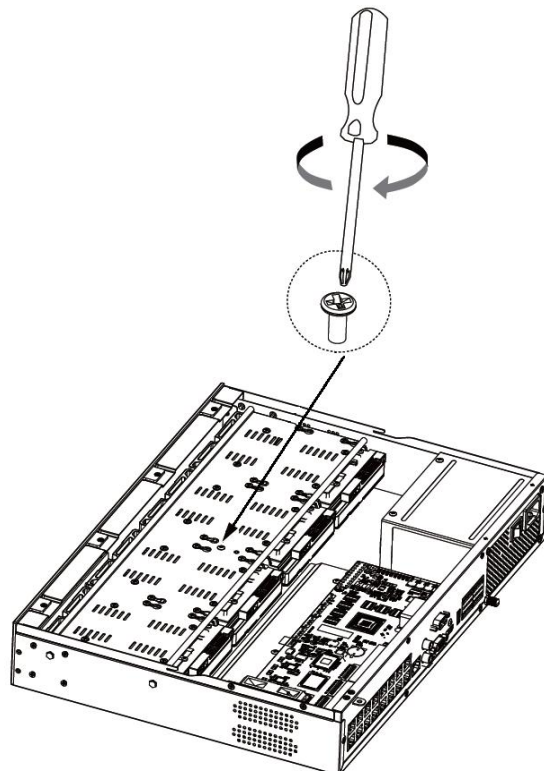


3) After securing the HDD on bracket, insert the bracket back to the NVR.



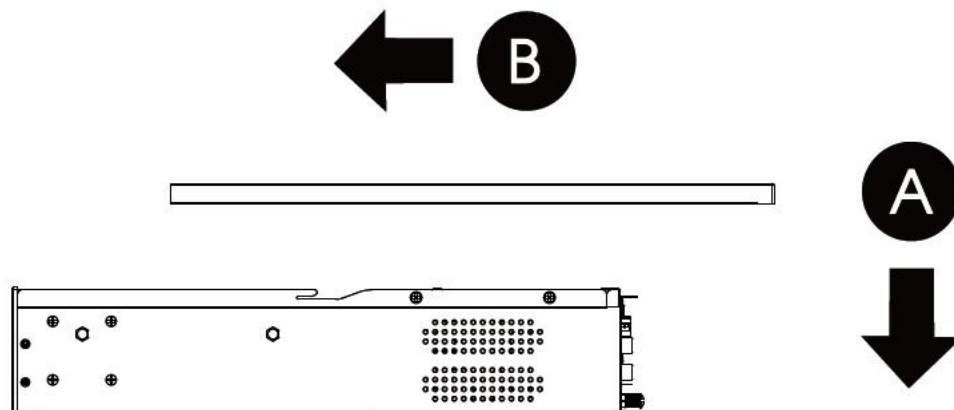
(PoE 7000 Series)

Step5: Check if all the 16 screws in HDD bracket are screwed tightly, if not, screw them tightly in an clockwise direction. And fix the bracket with a screw in the middle of bracket. Then connect the power cable and data cable to each HDD.

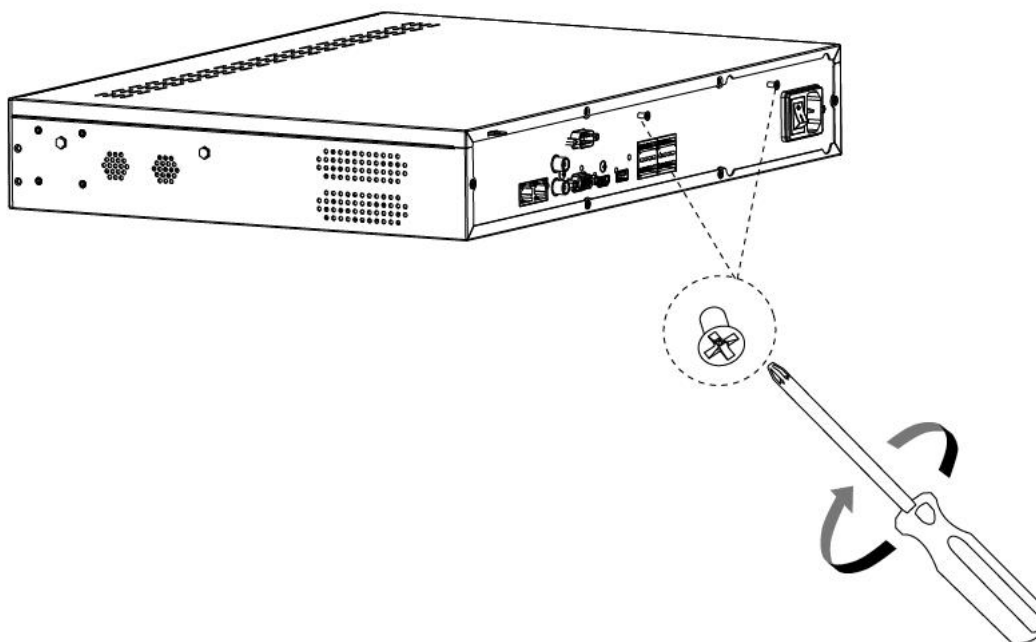


(PoE 7000 Series)

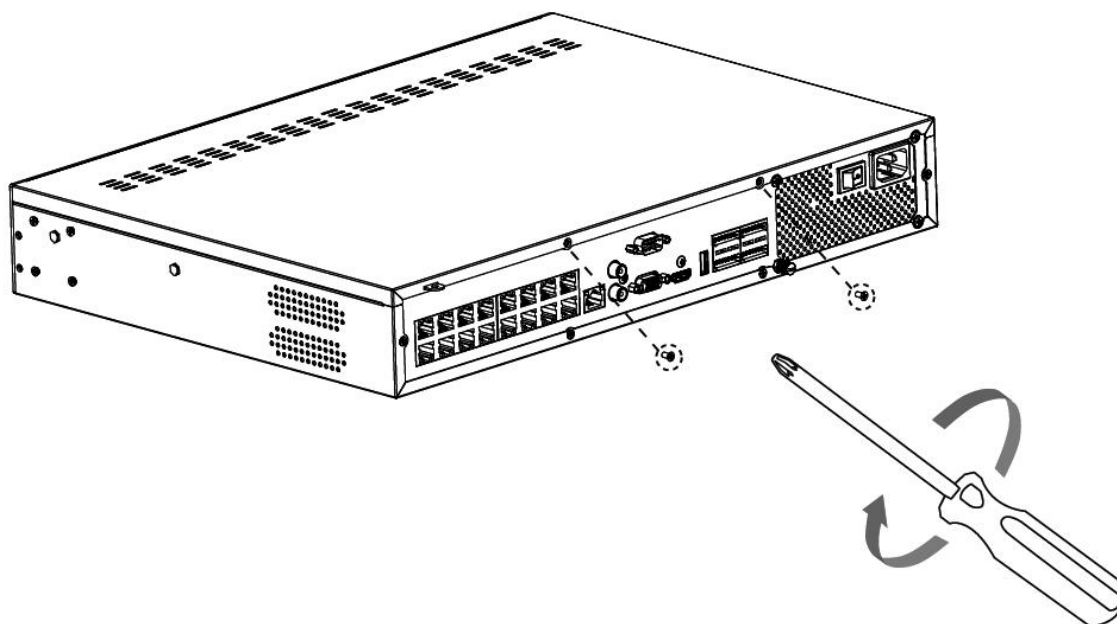
Step6: Pull down the upper casing and slide it to the left.



Step7: Retighten the screws on the rear cover.



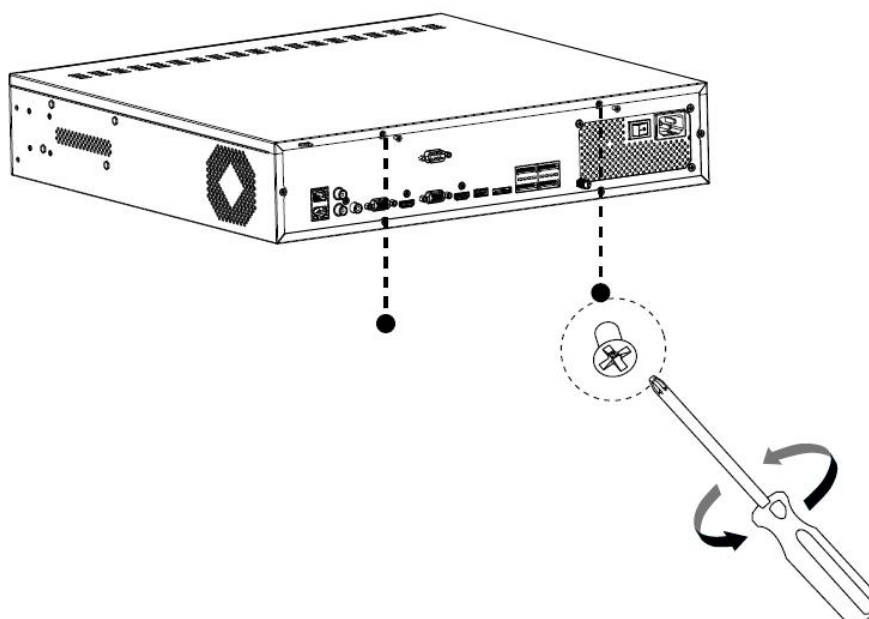
(Pro 7000 Series)



(PoE 7000 Series)

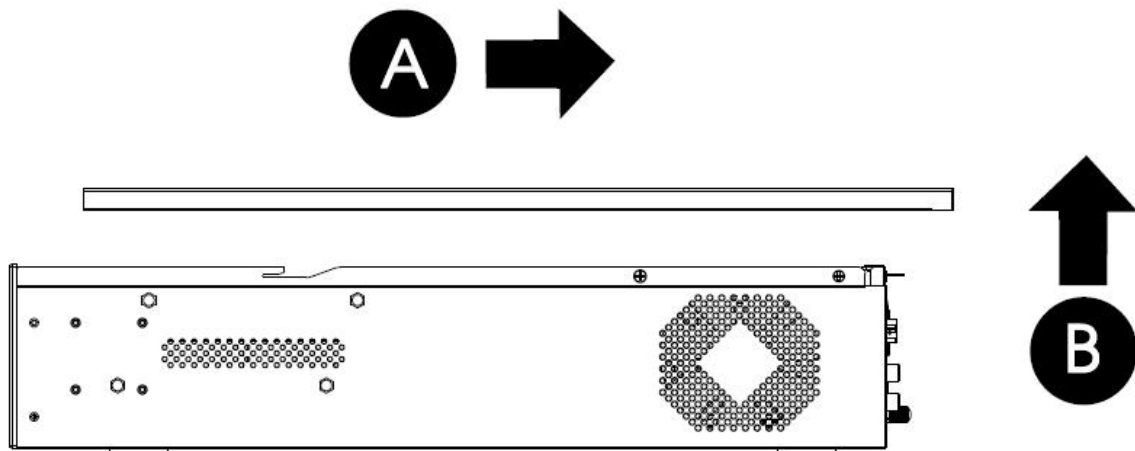
## 4.4 Pro NVR 8000 Series Installation

Step1: Using a cross screwdriver to remove the screws at the rear panel in an anticlockwise direction.

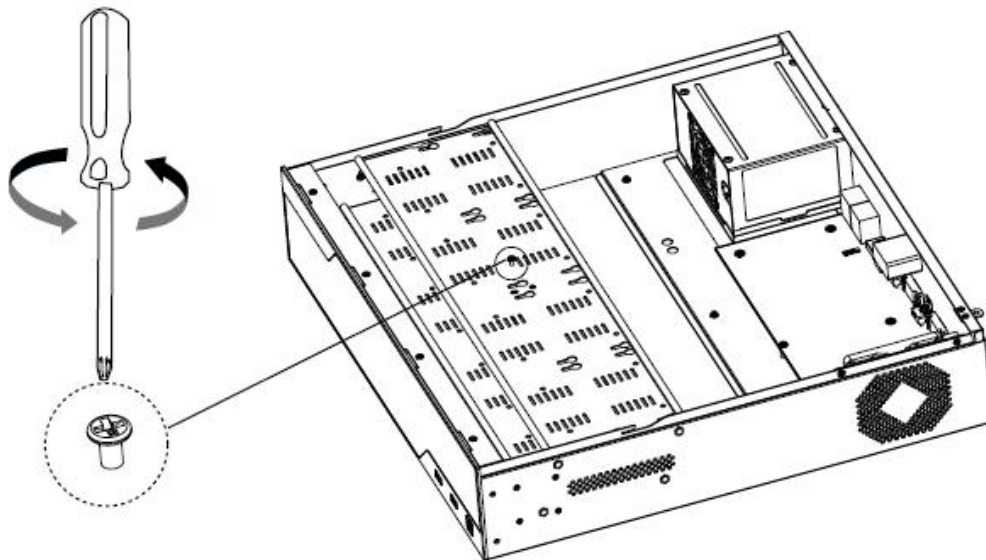


(Pro 8000 Series)

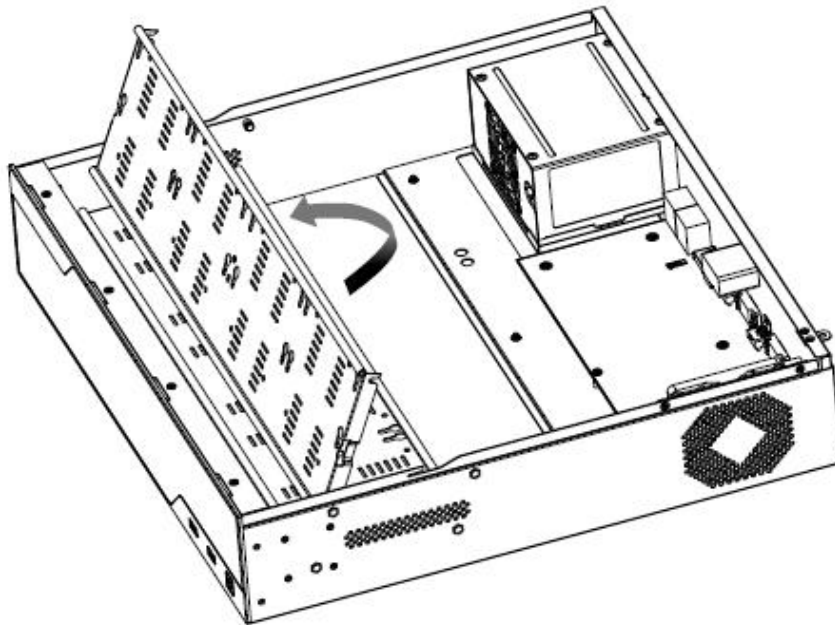
Step2: Slide the upper casing to the right first and lift it up.



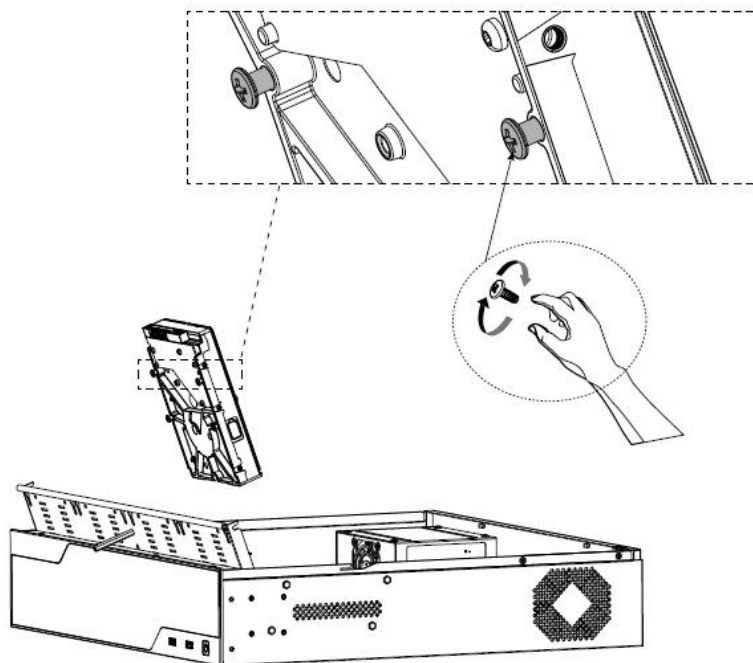
Step3: Using the screwdriver to remove the screw in the middle of HDD bracket in an anticlockwise direction (Pro 7000 has only one HDD bracket and Pro 8000 has two, while the installation steps are the same).



Step4: The HDD bracket is rotatable and can be taken down by pulling up and rotating one side of it.

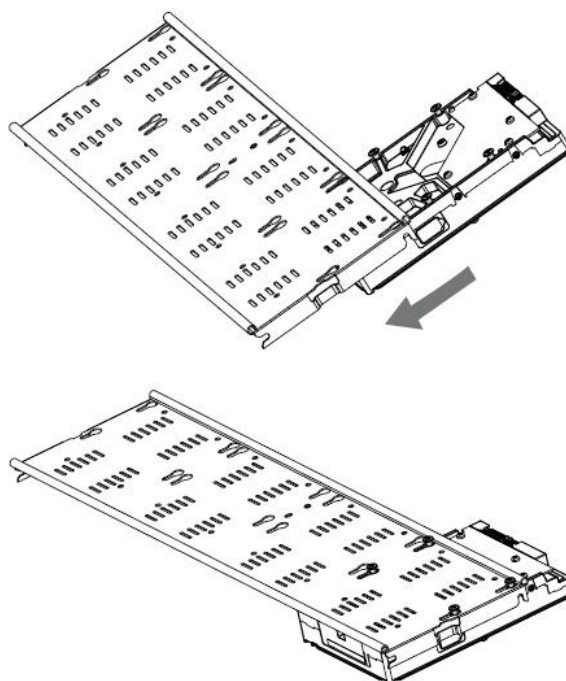


Step5: Secure the HDD with 4 screws. Don't screw tight and leave about 1mm distance at the side of each screw nut. As the enlarged drawing shows:

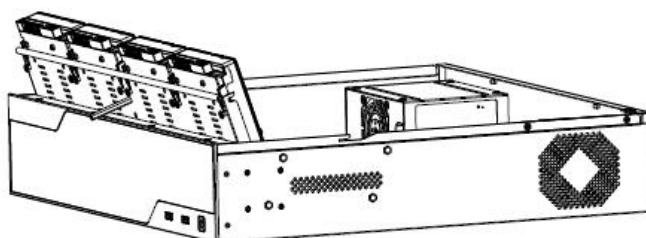
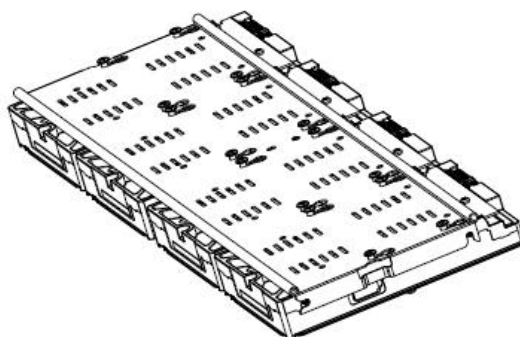


Step6: After securing each HDD with 4 screws, stuck the side with screw nuts in the bracket's slots and then slide down to fix the HDD in the bracket. Screw

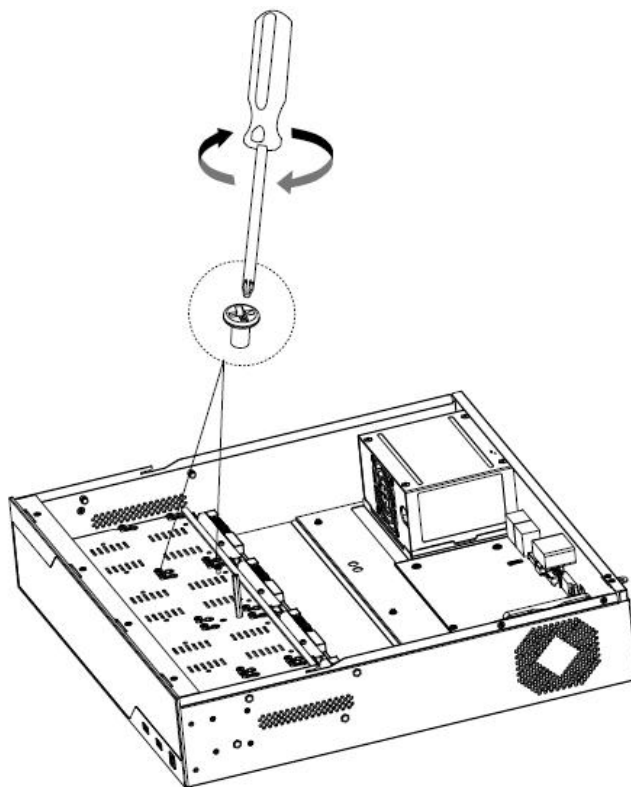
tight with screwdriver.



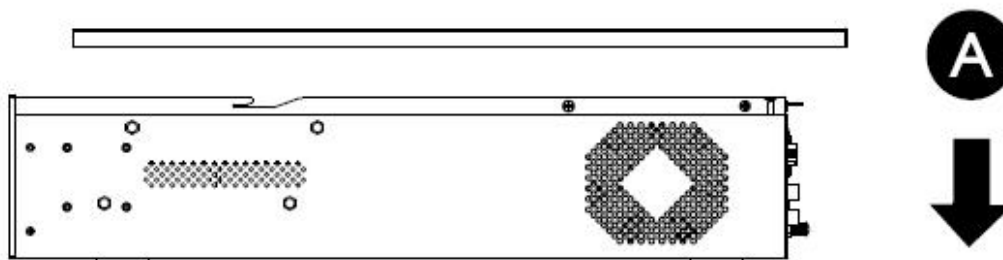
Step7: Repeat the above steps to install HDD in the bracket. Remember to check if you have screwed tight.



Step8: Secure the 16 screws in HDD and fix the bracket with a screw in the middle of it. Then connect the power cable and data cable to each HDD.

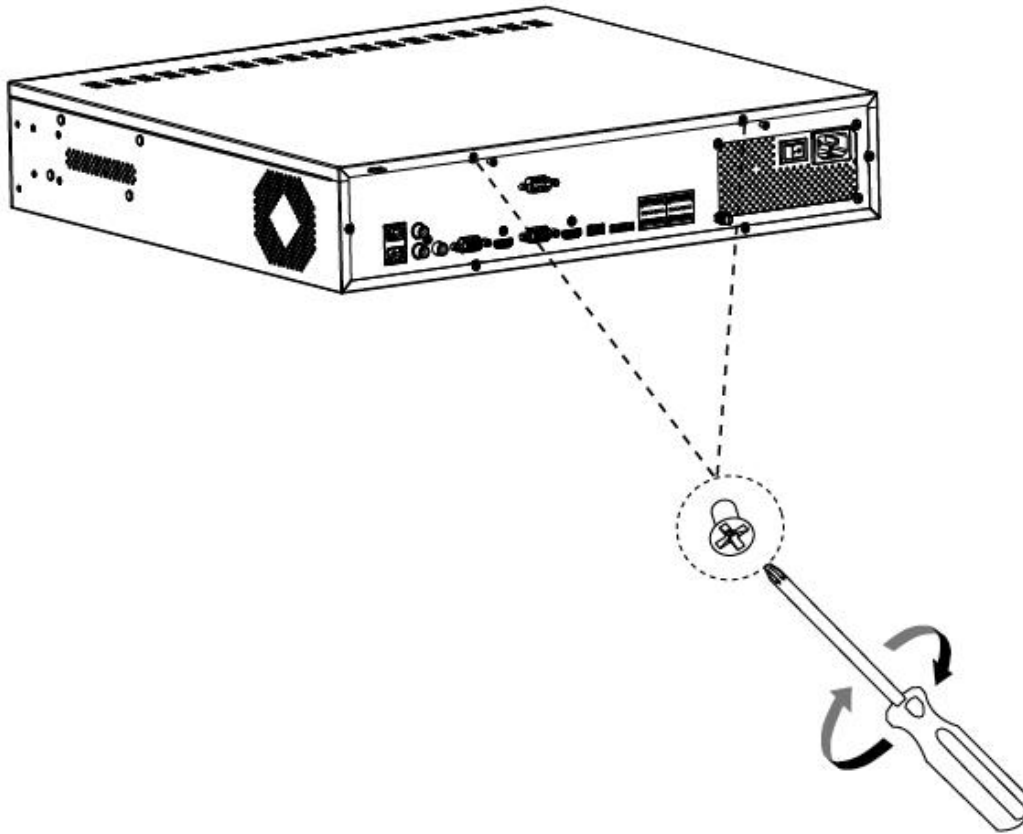


Step9: Pull down the upper casing and slide it to the left.



Step10: Retighten the screws on the rear panel.

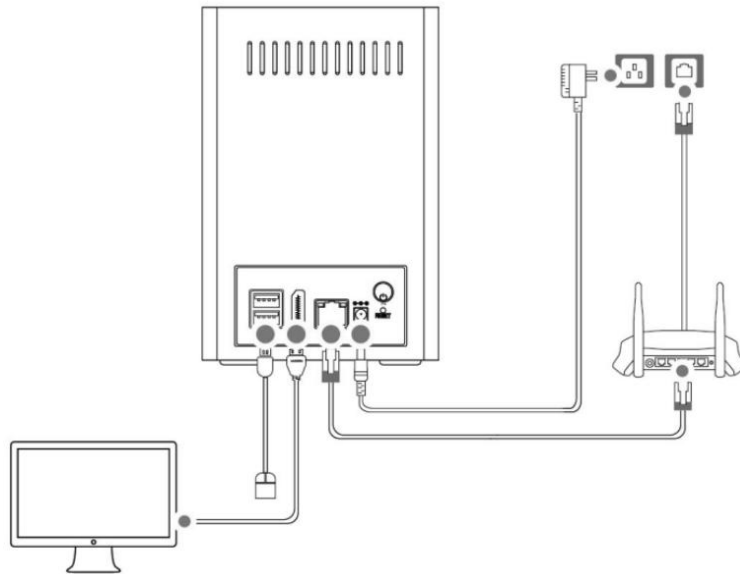




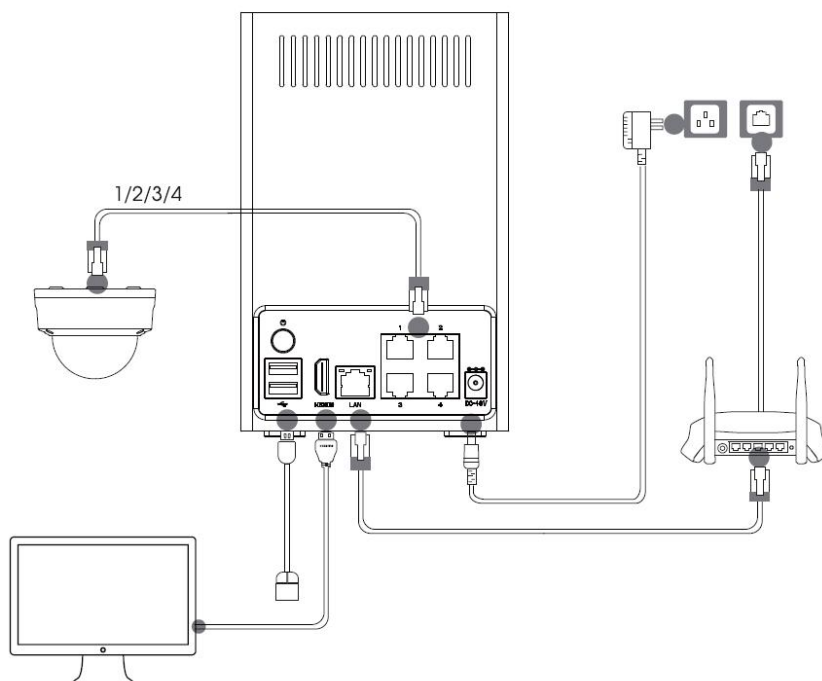
(Pro 8000 Series)

## 5.Connection Overview

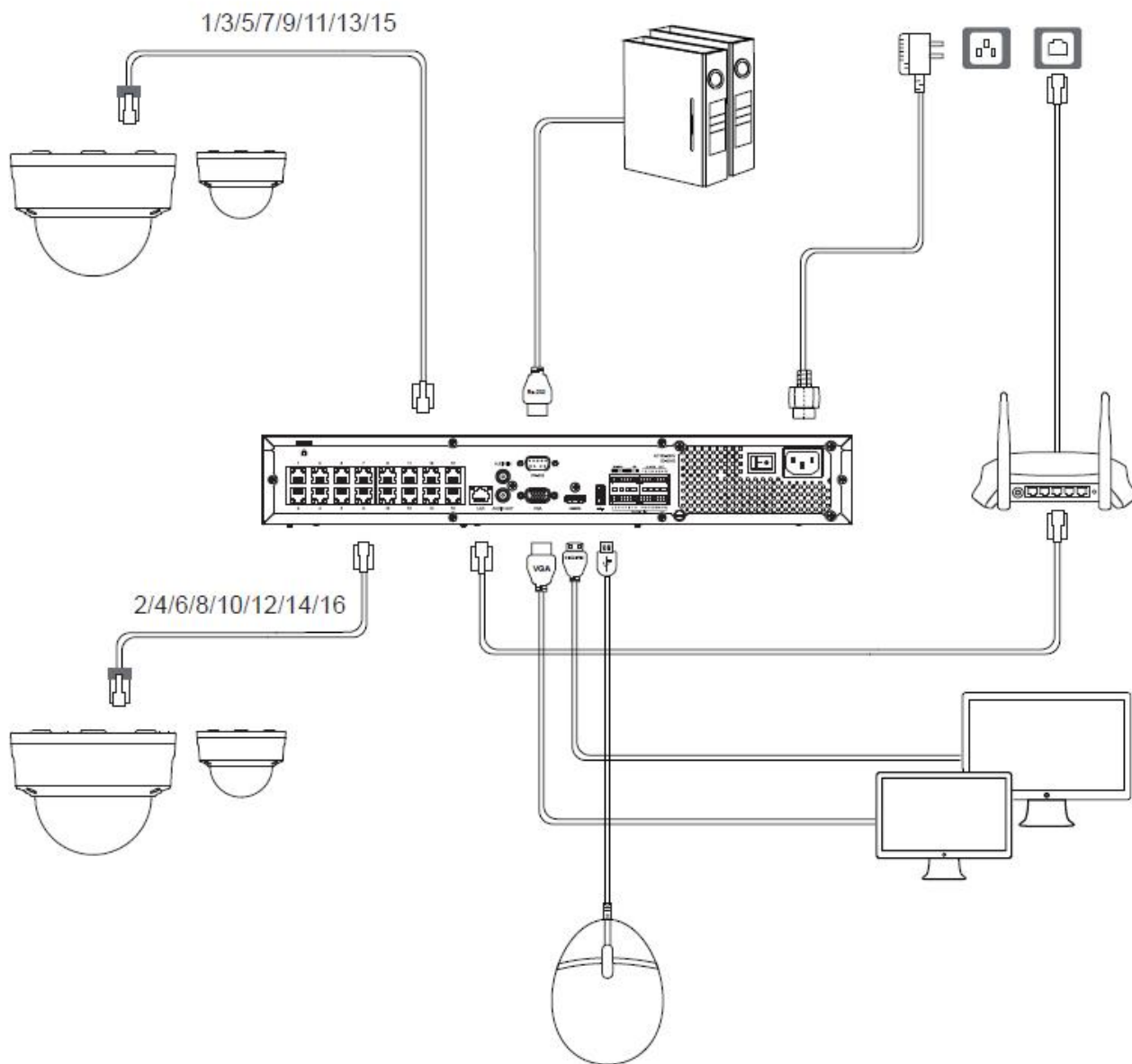
Connect different devices to the interfaces of NVR, taking Mini (PoE) NVR Series (MS-N1008-UNC & MS-N1008-UNPC) and PoE 7000 NVR Series (MS-N7016-UPH) for example:



(Mini NVR Series (MS-N1008-UNC))



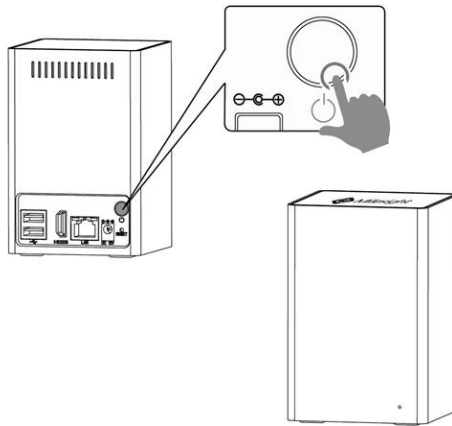
(Mini PoE NVR Series (MS-N1008-UNPC))



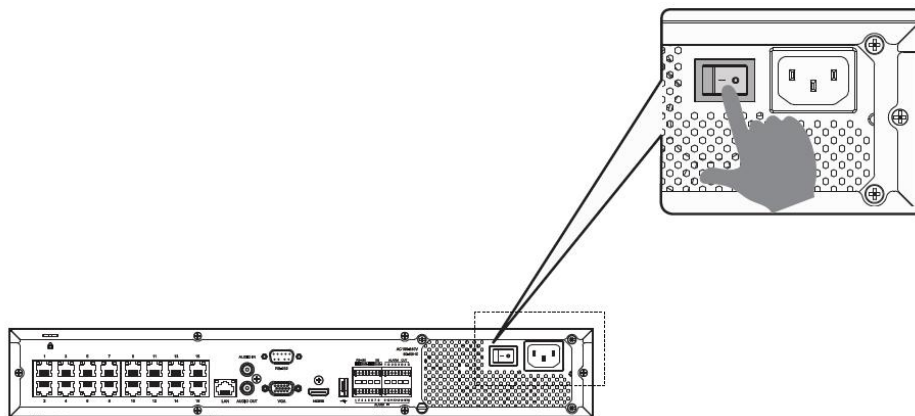
(PoE 7000 Series (MS-N7016-UPH))

## 6. Ready to Start

Press the power button, the LED Indicator will light steadily when it is connected to a power source, taking Mini NVR Series (MS-N1009-UT) and PoE 7000 NVR Series (MS-N7016-UPH) for example:



(Mini NVR Series (MS-N1009-UT))



(PoE 7000 Series (MS-N7016-UPH))

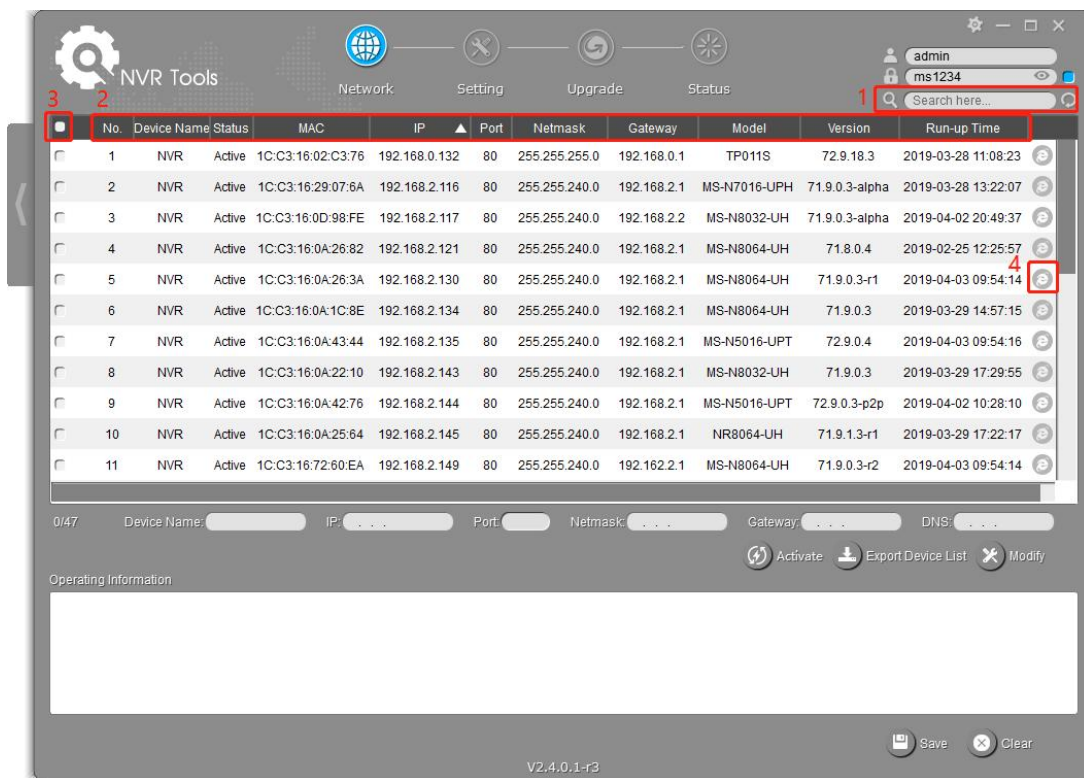
Note: Milesight 4-CH/8-CH/16-CH/24-CH Plug and Play NVR features 4/8/16/24 independent PoE Ports. The software can automatically detect and configure the network cameras just after being plugged the cable, greatly eliminating the need for much time and expertise, and achieving a virtually hassle-free installation process.

## 7. Access to NVR

### 7.1 Search the NVR via Smart Tools

If the IP address of the NVR is unknown, please use the Smart Tools to search the IP address. Smart Tools can automatically detect online Milesight NVRs connected in the LAN. You can get the IP address of the NVR by searching in the Tools.

Click on the NVR Tools button to enter the NVR Tools interface:



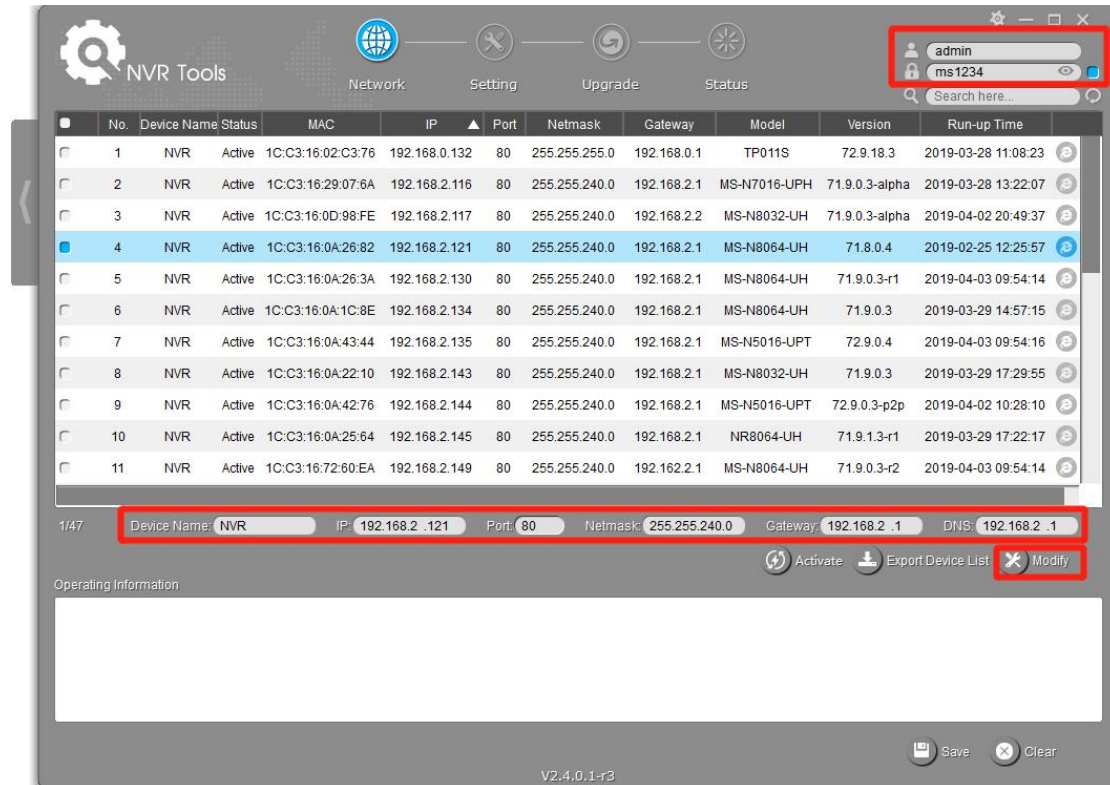
The specific steps are as follows:


Step1: Input the MAC address (marked as 1) to search your NVR;

Step2: Click on the area (marked as 2) to list the NVR one by one;

Step3: Click on your NVR in the list (marked as 3), then you can change the parameters including the IP address, Port, Netmask, Gateway and DNS.

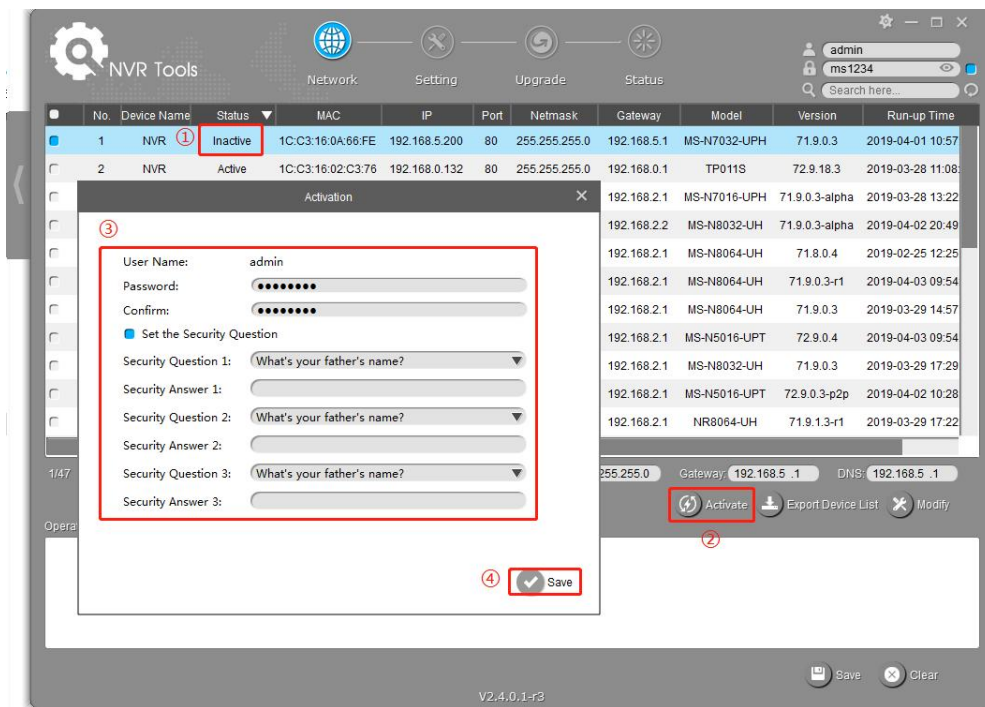
If the selected NVR shows "Active" in the status bar, you can directly type the User Name and Password (NVR with version lower than 7x.9.0.3 is using admin/ms1234 by default), change the IP address or other network values, and then click "Modify" button;



If the selected NVR shows "Inactive" in the status bar (NVR with version V7x.9.0.3 or above), click  to set the password when using it for the first time. You can also set the security questions when activating the NVR in case that you forget the password (You can reset the password by answering three security questions correctly). Click 'Save' and it will show that the activation was successful.

**Note:**

- (1) Password must be 8 to 32 characters long, contain at least one number and one letter.
- (2) You need to upgrade Smart Tools version to V2.4.0.1 or above to activate the NVR.



After activation, you can change the IP address or other network values, and then click “Modify” button. (Default IP address of NVR is 192.168.5.200. )

Step4: Click on the Browser button (marked as 4) to access to the web page of the NVR;

You can get more information about Smart Tools from the User Manual.

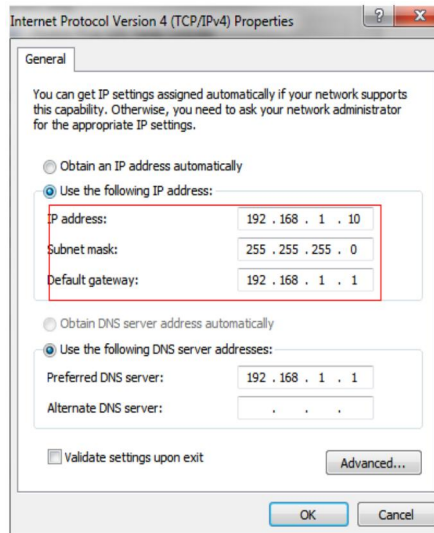
## 7.2 Via WEB

### 7.2.1 Log-in

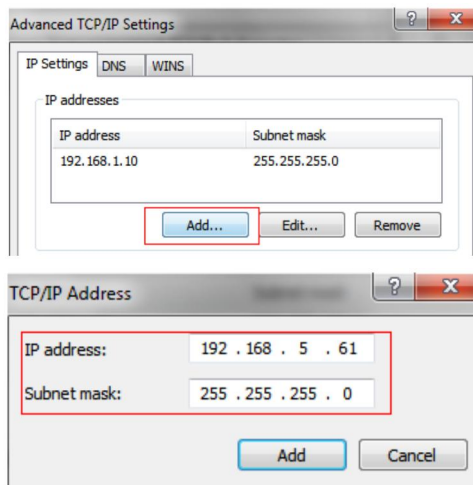
After the NVR being connected to the Internet, you can access to NVR via WEB by IP address.

If the network segment of the computer and that of the NVR are different, you need to change the IP address of computer to 192.168.5.0 segment, here are two ways as below:

- a. Start → Control Panel → Network and Internet Connection → Network Connection → Local Area Connection, and double click it.



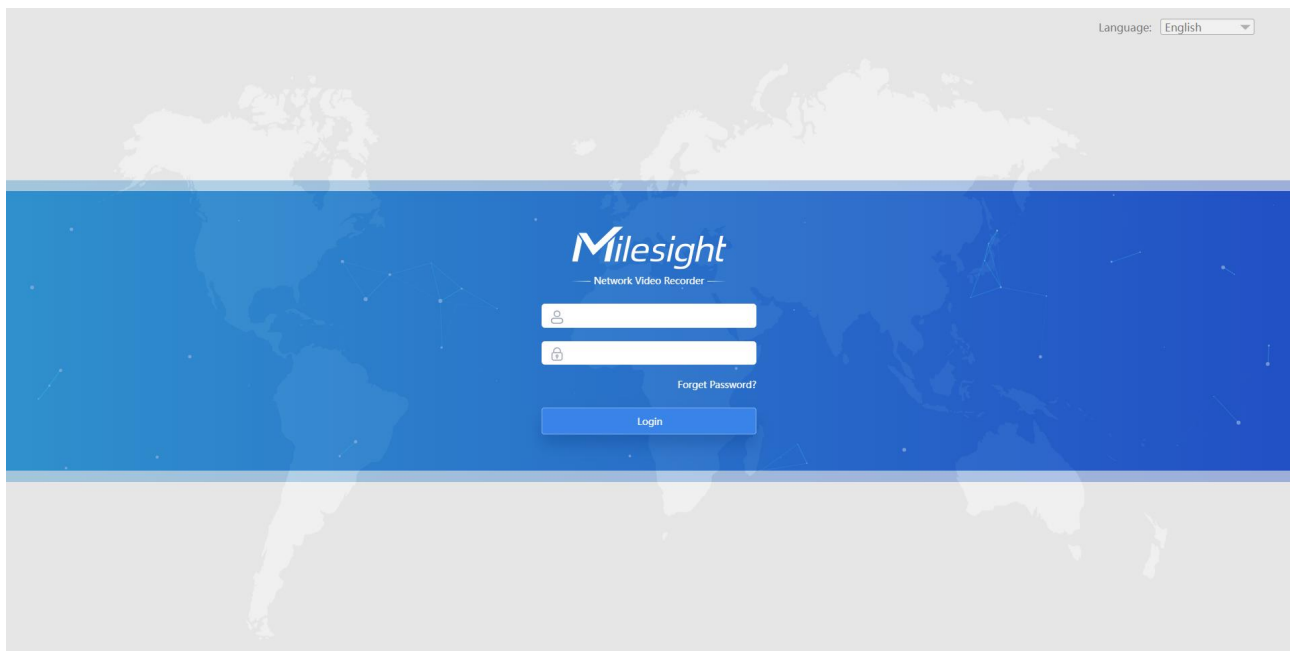
- b. Click “Advanced”, and then click “IP settings” → “IP address” → “Add”. In the pop-up window, enter an IP address that in the same segment with Milesight network camera ( e.g. 192.168.5.61, but please note that this IP address shall not conflict with the IP address on the existing network);



Step2: Start the browser. In the address bar, enter the default IP address of the NVR: <http://192.168.5.200>;

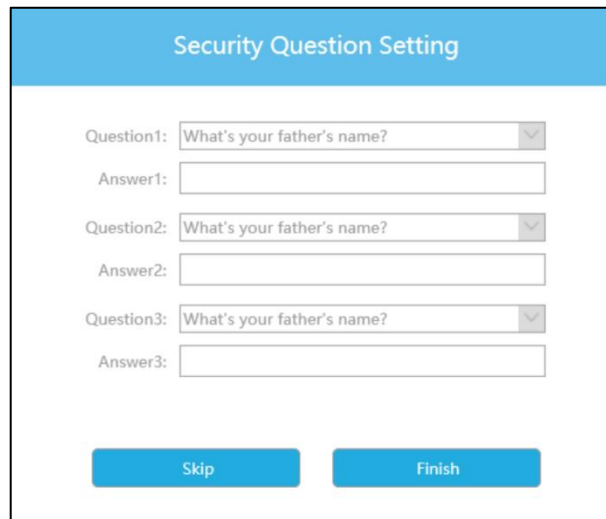
Step3: If the NVR’s firmware version is lower than V7x.9.0.3, it will directly display the login page, you can log in the NVR with default user name([admin](#)) and default password([ms1234](#));





If the NVR's firmware version is V7x.9.0.3 or above, you need to set the password first when using it for the first time. And you can also set three security questions for your device after activation. Then, you can log in the device with You can log in to the NVR with the username(admin) and a custom password.

The image shows the 'Activation' screen of the NVR. The title 'Activation' is centered at the top in a blue header. Below the header, there are three input fields. The first field contains the text 'admin'. The second field is empty. The third field contains the text 'Confirm'. At the bottom center of the screen is a blue 'Next' button.



Security Question Setting

Question1: What's your father's name?

Answer1:

Question2: What's your father's name?

Answer2:

Question3: What's your father's name?

Answer3:

**Note:**

- (1) Password must be 8 to 32 characters long, contain at least one number and one letter.
- (2) You can click the “forget password” in login page to reset the password by answering three security questions when you forget the password, if you set the security questions in advance.
- (3) If the HTTP Port number is not the default number 80, please input the IP address as follows:  
<http://IP:Port> .
- (4) If it's your first time to access to NVR via WEB, please install the plug-in. And please close the browser before installing the plug-in.

## 7.2.2 Live View

After logging in the NVR, you can add cameras to the NVR through the camera settings. After adding cameras, please click on the Live View button to get the preview.

Details are shown as follows:

**Camera Management**

Channel: 3 Channel Name: CAM3  
 Protocol: ONVIF IP Address:   
 Port: 80 Transport Protocol: Auto  
 User Name: admin Password:   
 Time Setting:  Sync Time With NVR

**Add** Refresh Delete

Channel	Channel Name	Edit	Delete	Status	IP Address	Channel ID	Port	Protocol	MAC	Firmware Version	Model	SN
1	111			!	192.168.69.66	-	80	ONVIF				
2	CAM2			✓	192.168.69.244	-	80	ONVIF	1CC3162C2075	45.7.0.79+25+47	MS-C2971-X128PC	CM33V112147000058

Free Receiving Bandwidth 195.50Mbps

**Camera List**

PTZ

001 Preset 1  
 002 Preset 2  
 003 Preset 3  
 004 Preset 4  
 005 Preset 5  
 006 Preset 6  
 007 Preset 7  
 008 Preset 8  
 009 Preset 9  
 010 Preset 10  
 011 Preset 11

P340/T-8

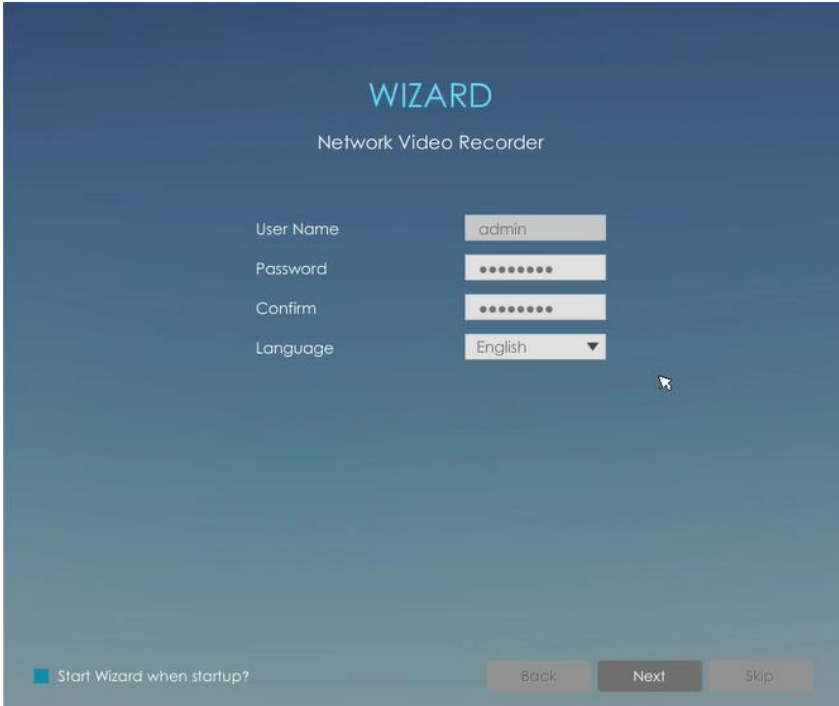
**Note:** About other configurations, you can refer to the user manual of NVR.

## 7.3 Via Monitor

There is another way to access to NVR which you can use the HDMI cable to let the NVR combine with monitor.

Details are shown as follows:

- ① If the NVR's firmware version is V7x.9.0.3 or above, you need to set the password to activate the NVR when using it for the first time.



The screenshot shows the 'WIZARD' setup screen for a Network Video Recorder. The title 'WIZARD' is displayed in light blue, with 'Network Video Recorder' below it. The form contains the following fields:

User Name	admin
Password	.....
Confirm	.....
Language	English ▼

At the bottom left, there is a checkbox labeled 'Start Wizard when startup?' which is currently checked. At the bottom right, there are three buttons: 'Back', 'Next', and 'Skip'.

You can also set three security questions after activating the NVR.

The screenshot shows the 'WIZARD' setup screen for a Network Video Recorder. The title 'WIZARD' is in light blue, and 'Network Video Recorder' is in white below it. The screen contains three sets of security questions, each with a dropdown menu for the question and a text input field for the answer. The questions are all 'What's your father's name?'. At the bottom left, there is a checkbox labeled 'Start Wizard when startup?'. At the bottom right, there are three buttons: 'Back', 'Next', and 'Skip'.

**Note:**

- 1) Password must be 8 to 32 characters long, contain at least one number and one letter.
- 2) You can click the "forget password" in login page to reset the password by answering three security questions when you forget the password.
- 3) If the NVR's firmware version is lower than V7x.9.0.3, you can directly log in the NVR with default user name(admin) and default password(ms1234)

## ② Password Modifying

The screenshot shows the 'WIZARD' setup screen for a Network Video Recorder, specifically the password modification step. The title 'WIZARD' is in light blue, and 'Network Video Recorder' is in white below it. The screen contains several fields: 'Admin Password' (masked with dots), 'New Admin Password' (with a checkbox), 'New Password', 'Confirm', and 'Language' (set to 'English'). At the bottom left, there is a checkbox labeled 'Start Wizard when startup?'. At the bottom right, there are three buttons: 'Back', 'Next', and 'Skip'.

### ③ Time Setting

The screenshot shows the 'WIZARD' configuration interface for a Network Video Recorder. The title 'WIZARD' is at the top, followed by 'Network Video Recorder'. The settings are as follows:

Time Zone	(UTC-08:00) United States - Pacific Time
Daylight Saving Time	Auto
<input checked="" type="checkbox"/> Synchronize with NTP server	
NTP Server	pool.ntp.org
<input type="checkbox"/> Set Date and Time Manually	
Set Date and Time	2018.02.08 21:55:07

At the bottom, there is a checkbox for 'Start Wizard when startup?' which is checked. To the right are three buttons: 'Back', 'Next' (highlighted in blue), and 'Skip'.

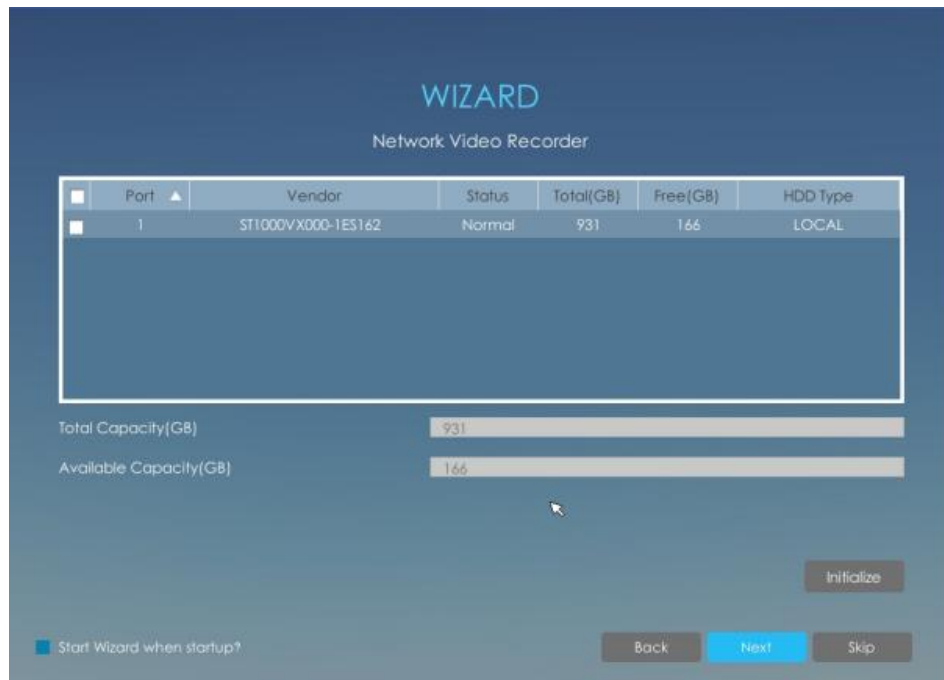
### ④ Network Setting

The screenshot shows the 'WIZARD' configuration interface for a Network Video Recorder. The title 'WIZARD' is at the top, followed by 'Network Video Recorder'. The settings are as follows:

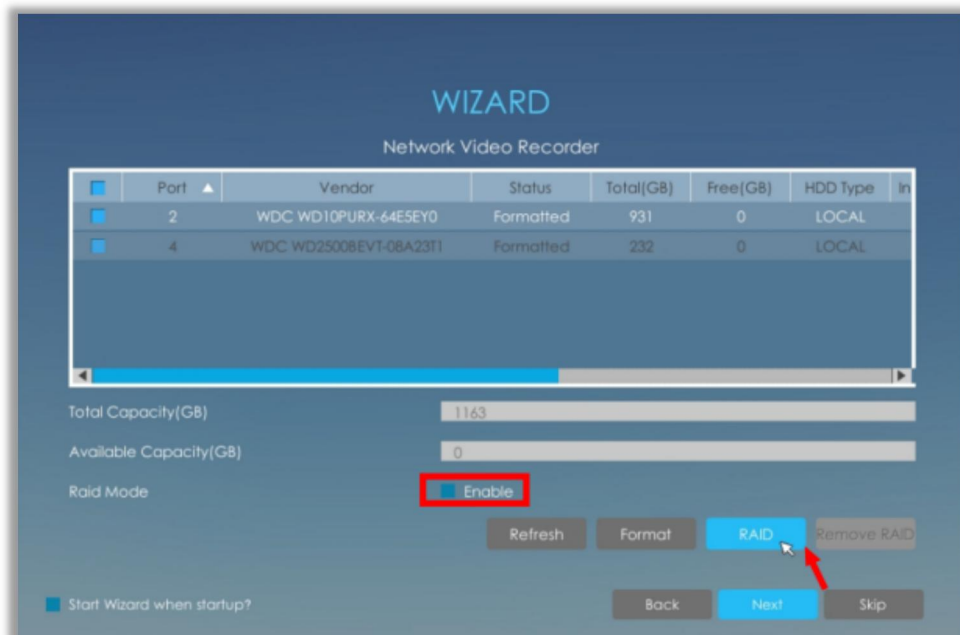
NIC	LAN
Enable DHCP	<input type="checkbox"/>
IP Address	192.168.7.101
Subnet Mask	255.255.240.0
Gateway	192.168.7.1
Preferred DNS Server	192.168.7.1
Alternate DNS Server	
PoE NIC IPv4 Address	192.168.20.1

At the bottom, there is a checkbox for 'Start Wizard when startup?' which is checked. To the right are three buttons: 'Back', 'Next' (highlighted in blue), and 'Skip'.

### ⑤ Hard Disk Setup

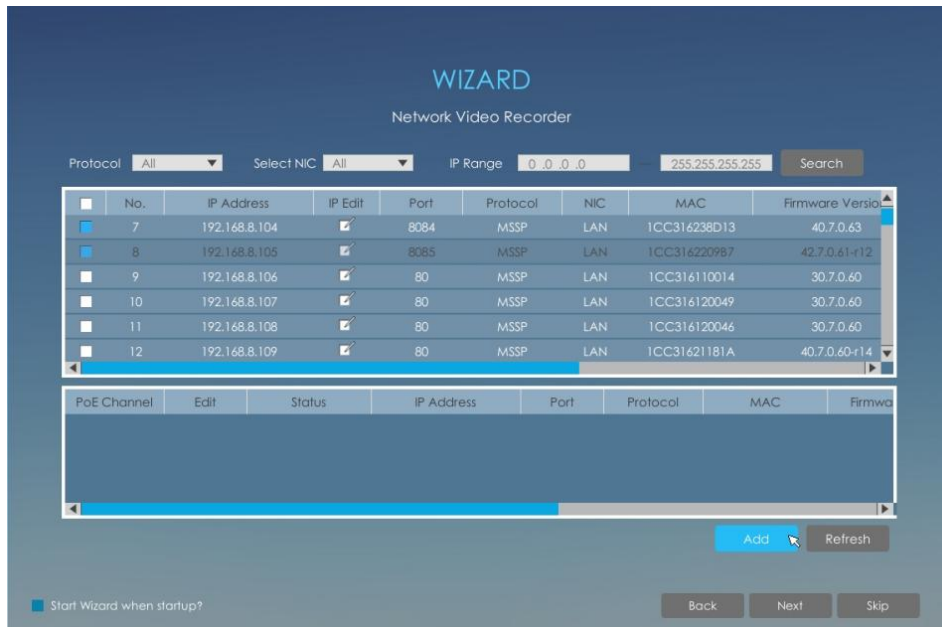


Click RAID to set up RAID for selected disk. RAID is available for Pro/PoE 7000 Series and Pro 8000 Series.

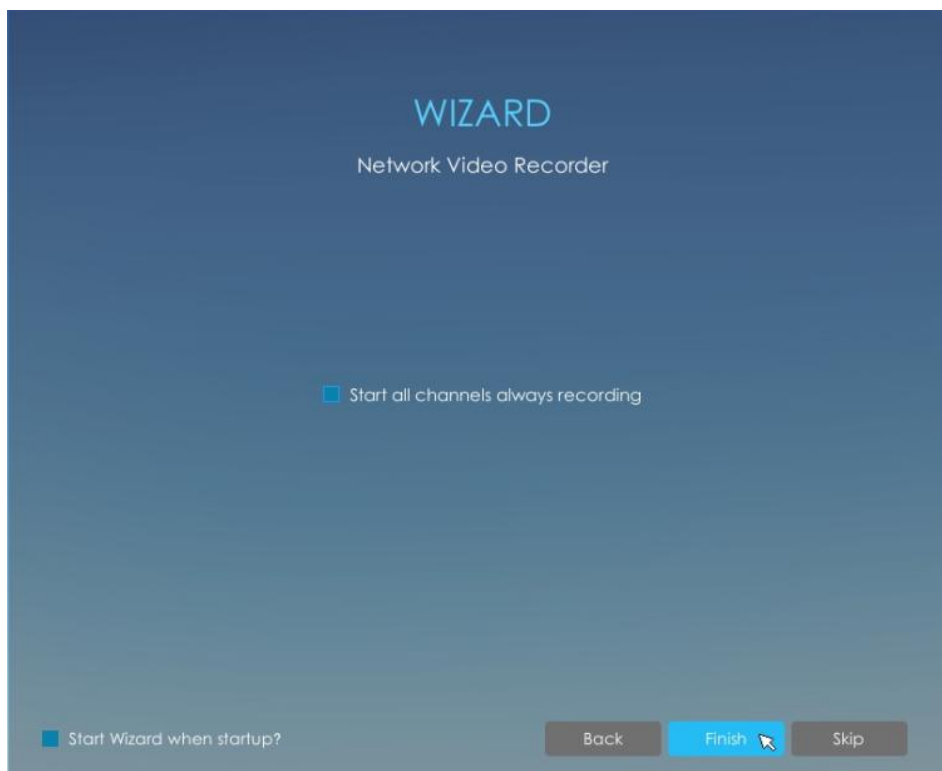


**Note:**  
RAID will be available after it was enabled and the device rebooted.

## ⑥ Camera Adding

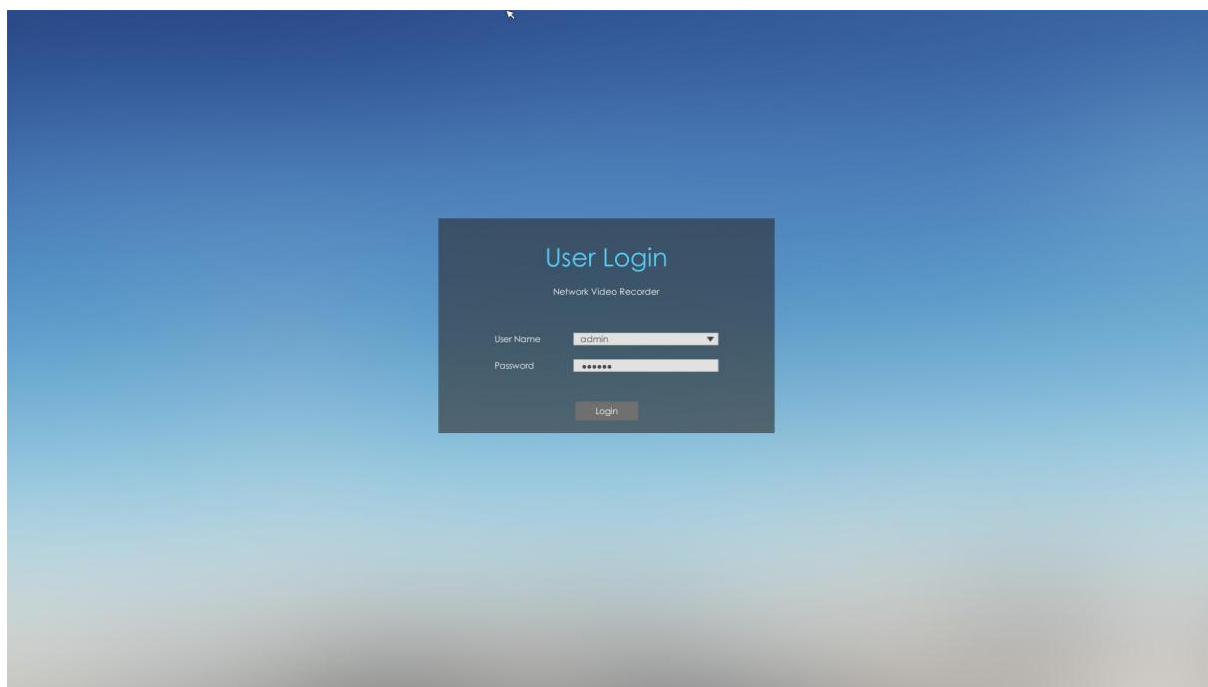


## ⑦ Record Setting



Also you can skip the wizard to login directly.

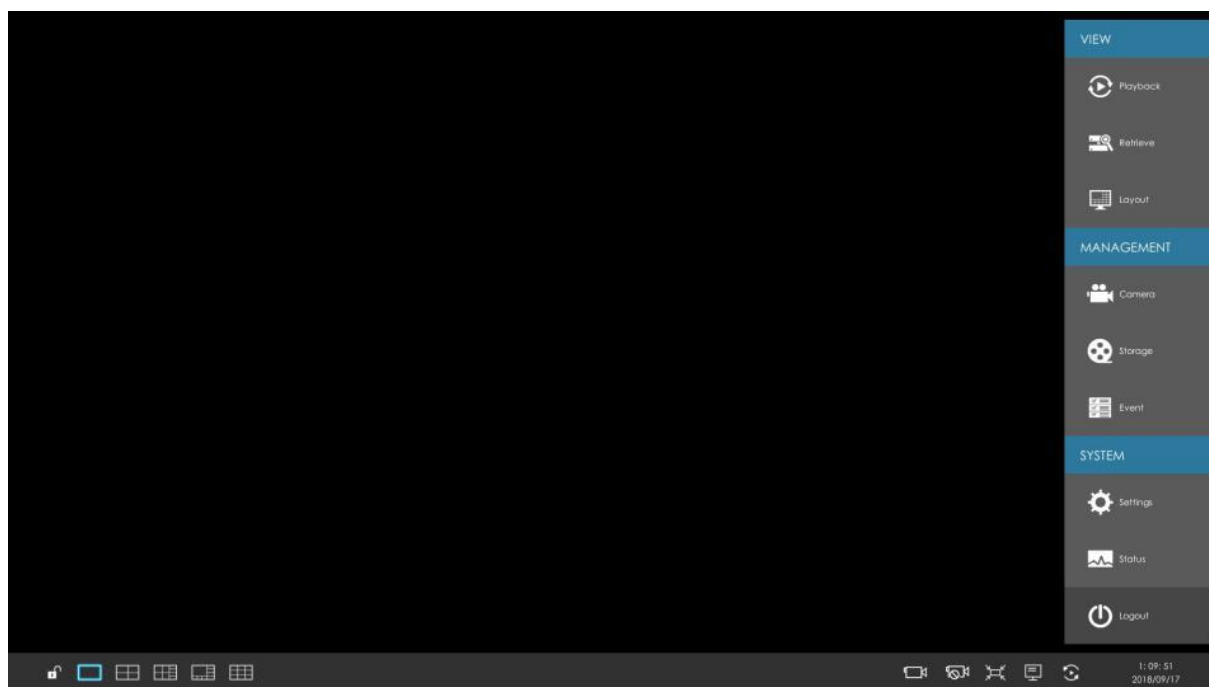




Then add cameras in Camera interface.

Details are shown as follows:

## ① Camera Management



## ② Camera Search

1. Select IP Range, NIC and Protocol, which includes ALL, ONVIF and MSSP.

2. Click search button to search cameras at the same LAN with NVR.
3. Select one channel, click Add button, input password and click Add button to finish
4. Check checkbox to batch adding the network cameras if they are with the same password, you can choose TCP or UDP transport protocol for it. Click OK to finish batch adding

The screenshot shows the 'Camera Settings' interface with a 'Device Search' section. A 'Batch Add' dialog box is overlaid on the table, with the following fields:

- User Name: admin
- Password: \*\*\*\*\*
- Transport Protocol: UDP

The 'Batch Add' dialog has 'Ok' and 'Cancel' buttons. Below the dialog, the 'Device Search' table is visible with columns: No., IP Address, IP Edit, Port, Protocol, NIC, MAC, Firmware Version, Model, and Vendor. The table contains 29 rows of camera data. At the bottom of the table, there are fields for 'IP Edit', 'Start IP', 'Subnet Mask', 'Gateway', 'Port', 'DNS', and 'User Name', along with 'Add' and 'Back' buttons.

After adding cameras successfully, you can back to the Live View to preview.